

Preparing Patent Departments for the Intellectual Capital Era

LEX VAN WIJK *



Intellectual capital is likely to dominate everybody's professional life in the near future, since it is the new wave of interest in the business world. It is therefore prudent for in-house patent professionals to be aware of this development, especially since they will be among the first to be affected by it. The aim of this article is to explain why this will be the case and what can be done to prepare a patent department for this new era to come.

THE INTELLECTUAL CAPITAL CONCEPT

What is intellectual capital? In financial terms, it is the difference between the market value and the book value of a company; or, as some put it, it is the value of a company's intangible assets: that value of the company that is not found in its balance sheets, often referred to as "goodwill." If, however, intellectual capital is thought of as being the value of a company's intangible assets, it is important to note that this value is not just the sum of all the intangibles. It also includes the ability to transform the intangibles into financial gain. It is not without reason that intellectual capital is often referred to as "knowledge that can be converted into profits."¹

Nowadays, the intangible assets of a company often outdo its tangi-

¹ Patrick H Sullivan (1998). *Profiting from Intellectual Capital, Extracting Value from Innovation*, p. 5. New York: John Wiley & Sons, Inc.

ble assets, something that is reflected in the significant—and sometimes staggering—difference between the market and book value of a company.

However, since conventional accounting methods take only tangible assets into consideration, one can no longer rely on those methods alone for an accurate assessment of a company's total value. Therefore, new methods need to be developed to assess a company's intellectual capital in a useful, reliable and, therefore, acceptable manner. Reasons for the need for such methods have been well argued². However, methods that are widely accepted by all parties involved—investors, stock market governing bodies, and businesses themselves—are not yet available, let alone standardized methods.

A pioneer in this field has been Skandia, the Scandinavian insurance and finance company. In 1995, it was the first company to present a supplement on intellectual capital to its annual report³. Since then, Skandia's valuation has gone up considerably, one of the reasons being that investors believe in Skandia's ability to prosper from its intellectual capital in the future.

Measuring the value of a company's intangible assets and pro-

² Steven M H Wallman, "The Importance of Measuring Intangible Assets: Public Policy Implications". In *Capital for our Time, the Economic, Legal and Management Challenges of Intellectual Capital* edited by Nicholas Imperato. pp. 181-191. Stanford California: Hoover Institution Press.

³ Visualizing Intellectual Capital in Skandia. Supplement to Skandia's 1994 Annual Report. This and subsequent supplements (one every six months) are assessable via Internet. See www.skandia-afs.com/.

viding the related information to the financial world is just one way of creating a competitive advantage in the marketplace. Equally, if not more important, a reliable assessment of the value of the company's intangible assets enables the business to make better decisions in respect to these assets. For a company to be successful in the future, a committed effort will be required to ensure that value will be created for future commercialization and that as much value as possible will be extracted from a company's existing intangible assets.

MAJOR CHALLENGES: THE GOOD, AND THE POSSIBLE BAD NEWS

A major component of intellectual capital consists of intellectual assets, which include a company's codified competence, know-how, technology, databases, procedures and intellectual property rights, the latter of course including patents, which will be focused on in this article.

Since patent rights will become increasingly important to companies, patent professionals will be expected to provide a large contribution to the management of a company's intellectual assets to ensure that these rights will indeed provide a competitive advantage and add value to the company's bottom line. There are two major challenges that patent attorneys

* *Lex van Wijk is Patent Counsel, Corporate Technology, for Siemens AG, Munich, Germany.*

may have to face:

1) the measurement of the value of the company's patent portfolio in a reliable manner; and

2) the management of the patent portfolio with the view to creating value that can be leveraged in the future and to extract as much as possible value from the existing portfolio.

Some patent professionals may think that nothing will change in their work. Various reasons may apply. In some companies, for instance, intellectual asset management may already have been intrinsically present to some extent. Other patent professionals just may not believe in the concept of intellectual capital altogether.

For patent professionals belonging to the latter category and those who would not like to be involved in any change, there is bad news. Whether they like it or not, and despite some efforts to ridicule the concept⁴, intellectual asset management is here to stay.

The measurement of the value of patents as such is already a very complicated matter and so is the value extraction from one's patent portfolio. But that is not all. In addition, the relationship of patent professionals with their business colleagues is likely to change considerably.

DOW'S SUCCESS

Dow Chemical is one of the companies that are making an effort to manage its intellectual assets more effectively. In recent years, it pruned its patent portfolio considerably, thereby saving approximately \$40 million in patent maintenance costs over a 10-year period, while simultaneously increasing its licensing income from \$25 million in the mid-1990s to well over \$125 million currently⁵.

4 See note 2, Tim Draper, "Intellectual Capital Measurement for Start-ups: The Best of Intentions, the Worst of Outcomes", pp. 233-247.

5 See note 1, page 107.

Cynics will argue that Dow's patent department apparently did not have its act together for many years and that it was about time something was done about it. This is not likely to be the case. These cynics are advised to make an effort and find out what really has been established at Dow⁶ and to understand, for instance, what something called the technology factor method is all about⁷ It will be an eye-opener to them.

They will start to realize that intellectual asset management is not just a matter of pruning deadwood from a patent portfolio and making an extra licensing effort. Of course this helps, but there is much more to it. It involves a new way for patent professionals to look at their work, their relationships within the company and the competition. In order to be successful, a new culture will need to be established within a patent department, one with more emphasis on value creation and extraction.

CHANGING RELATIONSHIPS

Traditionally, patent professionals have considered the patent portfolio to be their "property." It is a matter exclusively dealt with and managed by patent professionals. Some are actually reluctant to share information about patents and related matters with their business colleagues, since they fear a situation may result where their colleagues themselves, and without proper consultation of the patent department, will decide on matters such as infringement and validity. Although that concern may be real, it is more likely to say something about a patent department's profile and the relationships and communication within a company than about anything else.

6 See note 1, Gordon Petrush, "Intellectual Asset Management at Dow Chemical", pp. 205-220.

7 See note 1, Sam Khoury, "Valuing Intellectual Properties", pp. 335-356; and pp. 87-90 of this Volume of *les Nouvelles*.

Patent rights and other intellectual property rights in general will become "shared" property within a company. Decisions regarding patent assets will be business decisions or, more accurately, informed business decisions reached in consultation with patent professionals—provided that patent professionals have positioned themselves to ensure that they give the most value possible to the company and that their contribution is recognized by the business. Otherwise, a situation could arise in which patent professionals would mainly be seen as draftsmen for patent applications.

It is also likely that business staff (including finance personnel and strategists) will want to take control of licensing activities, especially once these activities become increasingly successful and start to create considerable revenues for a company.

Without doubt, such developments could potentially be frustrating for patent professionals, because patents will become more important for their companies (and consequently their departments' profiles will rise), whereas at the same time, the work of patent professionals may become less interesting. This may especially apply to U.S. patent attorneys because they are traditionally more involved with licensing activities than their European colleagues. In view of changing relationships, a major and immediate challenge for patent departments will be to position themselves in such a way that they add maximum value to the business, while maintaining the level of job satisfaction within the department.

The good news is that a company like Dow has already proved to be up to it,⁸ so why should it not work for other companies and their

8 Conversation between the writer and Steve Grace, Dow Chemical's General Patent Counsel, during which it became clear that Dow's patent department's profile has risen, whilst at the same time work has become more interesting due to an increasing number of counseling and transactional activities.

patent professionals? But Dow is not the only successful company. Others like Du Pont, Xerox and Eastman Chemical, to name a few, are also making good progress, but then all these companies have the advantage that they are a member of the ICM Gathering.⁹

PREPARATION IS NEEDED

In order to prepare themselves, patent professionals should, of course, familiarize themselves with the concept of intellectual capital. This should not be too difficult since there is an abundance of excellent literature available these days.¹⁰ Additionally, they should start experimenting with the new insights that they will gain into this field, in order to find out what works for their companies and what doesn't.

It is further recommended that they look into and work on the following set of integrated preparation factors:

- vision,
- strategy,
- proactivity,
- transparency,
- flexibility and
- trust.

Of course, these factors can be considered to be self-evident, but then the problem with the self-evident is that it does not get the atten-

tion it deserves; it is taken for granted. It is believed that a committed effort to work on these preparation factors will provide patent professionals a new perspective and their patent departments the new culture needed to contribute to the future success of their companies.

The Preparation Factors

Vision. What is it that the patent department wishes to establish? What does it stand for? How does it fit within the company at present, and how will it fit within the company in the future? What role will it need to play to assist the company in establishing its business objectives? These are all very important questions, which are often easier to ask than to answer. Nonetheless, an effort should be made to answer these questions because it makes one understand the business context in which one has to work. An effective tool to use in such effort is the preparation of a mission statement, since it will focus the department's efforts and remind people what the role of their department is all about—what its objectives really are.

For a mission statement to be successful, all persons in the department should be actively involved in its development and all should buy into it once it has been established. To give an example, the mission statement of Burmah Castrol's patent department (before Burmah Castrol was taken over by BP Amoco last year) read as follows:

"Our aim is to be the automatic first contact for patent issues for all the Group Businesses by providing an expert, cost-effective, efficient and tailor-made patent service to each Business. This will ensure that the Businesses can take informed decisions regarding the protection and commercialization of their technologies and issues relating to Group owned patents and third party patents. In this way we will

add value by securing a competitive edge for the Group locally and globally."

Strategy. How can the patent department's objectives be established?

The first step is to look into each individual objective and to determine the fundamentals that are the key to success in establishing each objective or that are needed to move toward the realization of the objective in question. The resulting list of fundamentals will include a number of particular attitudes and abilities—for instance, proactivity and transparency—necessary for patent professionals and their departments to establish these objectives. In turn, these attitudes and abilities can, in practice, be manifested by activities.

The plan of action, the selected activities and the time to develop these activities will be the department's strategy to implement. To make the strategy work, everyone within the patent department needs to be committed to its implementation. One of the most important activities a patent department can develop is the establishment of a patent strategy for the company, or when applicable, for each individual strategic business unit within the company.¹¹

A patent strategy is a framework of decision-making processes and procedures that ensure that the patent activities of a business are consistent with both R&D and business strategy and its objectives. An appropriate patent strategy includes at least the following elements:

- education program
- confidentiality program
- monitoring patent activities of

¹¹ Although not a lot has been written on this subject, there exists some interesting literature. See for instance Stephen C. Glazier (1997), *Patent Strategies for Business*, Washington: LBI Law & Business Institute, for a useful discussion of patent strategies. See also, H. Jackson Knight (1996), *Patent Strategy for Researchers and Research Managers*. New York: John Wiley & Sons, Inc.

⁹ For more information on the ICM Gathering, see www.ICMGroup.com.

¹⁰ See notes 1, 2 and 3. Further examples, to name a few, include: Thomas A. Stewart (1999), *Intellectual Capital, the New Wealth of Organizations*. London: Nicholas Brealey Publishing; Johan Roos, Göran Roos, Nicola C. Dragonetti and Leif Edvinsson (1997), *Intellectual Capital, Navigating the New Business Landscape*. London: MacMillan Business; Karl Erik Sveiby (1997), *The New Organizational Wealth, Managing & Measuring Knowledge-based Assets*, San Francisco: Berrett-Koehler Publishers, Inc.; Leif Edvinsson and Michael Malone (1997), *Intellectual Capital, The Proven Way to Establish Your Company's Real Value by Measuring Its Hidden Brainpower*. London: Piatkus; Annie Brooking (1996), *Intellectual Capital, Core Asset for the Third Millennium Enterprise*, London: International Thomson Business Press.

third parties

- report of inventions
- review of inventions
- filing program
- enforcement function
- infringement of third party patents
- patent assets audits
- licensing
- due diligence

Proactivity. The role of a patent department traditionally has been a relatively reactive one. It is expected to take action in respect of a large number of requests or demands that are either dictated by the business or by national or regional patent authorities. In view of this and the increasing workload of patent departments in general, it is usually felt that there is no time left to do useful things on top of “daily work,” let alone to be genuinely proactive.

However, proactivity is one of the keys to a department’s future success because it can enable the department to make an effort in respect to things that really matter (i.e., add value to the business), but which are otherwise not addressed because of lack of time. These usually include the type of activities that would contribute to the realization of a patent department’s objectives.

Proactivity can be realized by improved time management¹² and more effective delegation.¹³

Activities that a proactive patent department could develop in order to establish its objectives could include:

- development of a patent strategy and its implementation;
- development of a program to

educate business and R&D personnel on patent matters;¹⁴

- development of a patent information database;¹⁵
- organization of annual patent assets audits;
- consideration of patent evaluation indices and measurement indicators;¹⁶ and
- transfer of best practices by benchmarking with other companies.

It is important to check with business management regarding whether these activities are aligned with their objectives before developing and implementing them—and to obtain their support. Additionally, each individual patent professional should be expected to have a proactive approach toward possible protection and commercialization of new technology.

Transparency. Businesses will need to have ready access to all sorts of patent information. Such

¹⁴ Business and R&D personnel should appreciate and understand what patents are, how they can be used to provide competitive advantage, and what the role of the patents department is within the company. It is therefore advisable to put an internal education program in place to bring all business and R&D personnel up to an acceptable base level of knowledge regarding patent rights and intellectual property rights in general. Such program could for instance be an integral part of the induction process for all new business and R&D personnel. Also a program of periodically reminder sessions for existing staff might prove useful.

¹⁵ A patents information database to which business and R&D personnel could have access may for instance include information on basic patent principles; list(s) of reported inventions; blank form to report electronically a new invention; patent portfolio survey(s); third party issues; patent awareness profiles. See note 1, Kelly Hale, *Creating the Portfolio Database*, pp.129-141, for a discussion on the development of a portfolio database. Interestingly, Hale seems to suggest that the development of such database should emanate from the business, not the patents department, since it may otherwise receive little support. This is not necessarily the case. In *Burmah Castrol* for instance the proactive approach to develop such a database has been successful.

¹⁶ See Leif Edvinsson and Michael Malone (1997), *Intellectual Capital, The Proven Way to Establish Your Company's Real Value by Measuring Its Hidden Brainpower*, pp. 80-85 and 177-188, London: Piatkus. See also note 2, Gordon P Petrush, “Intellectual Capital Accounting as a Management Tool”, pp. 202-208.

information will include the costs of every step in the patenting process, the costs to-date of a particular patent series and territorial coverage of a particular patent series.

In order to make this work, a patent department needs to be transparent to the business, and this can be realized by:

- having open lines of communication with the business;
- having a patent information database to which the business has access;
- informing the business about the department’s mission statement and its strategy;
- making sure the business knows the structure of the department;
- having clear decision-making processes in place that leave no doubt about responsibility and accountability;
- informing the business about the range of services the patent department can offer and the level of service it may expect to receive;
- explaining to the business its responsibilities towards the patent department; and
- developing a time-monitoring system that enables the business to understand the amounts of time spent on the various patent activities.

Flexibility. In times of continuous change, it seems quite obvious to expect a patent department to be flexible. But what does it mean in practice and what does it require?

It means that patent professionals need to learn how to adapt themselves successfully to change. This is important because many patent professionals’ work includes a lot of routine tasks—especially when one has been responsible for a particular part of the patent portfolio for a number of years. Any change of the role is therefore likely to be an unsettling experience.

¹² See Stephen R Covey (1992), *The Seven Habits of Highly Effective People*, London: Simon & Schuster Ltd., for effective time management teachings. See also Stephen R Covey, A Roger Merrill and Rebecca R Merrill (1994), *First Things First*, London: Simon & Schuster UK Ltd.

¹³ See David Oates (1993), *Leadership: The Art of Delegation*, London: Century Business, for a study of delegation in general.

Successful change can be realized by:¹⁷

- communicating the reasons for change, and pointing out opportunities;
- creating a sense of urgency;¹⁸
- involving all patent professionals in the change process, and ensuring they buy into it;
- attending external workshops on change;
- organizing internal workshops to discuss the activities that need to be developed, as well as various aspects of intellectual asset management;
- inviting a recognized authority in the field of intellectual capital to give a presentation followed by questions and a discussion;
- realizing and making effective use of the true potential of the people within the department;¹⁹
- encouraging teamwork in respect of the patent portfolio management and special projects;
- encouraging patent professionals to learn more about the needs and objectives of the business, and what it is that drives the business;
- generating short-term successes, for instance by organizing patent assets audits;
- creating an atmosphere of trust; and
- evaluating the change process and its progress.

Trust. Trust denotes honesty, fairness, openness and integrity; all essential ingredients that enable the creation of rich and lasting relationships within a patent department as

¹⁷ See Rosabeth Moss Kanter (1983), *The Change Masters*, London: George Allen & Unwin, for a study on change processes in general. See also John P Kotter (1996) , *Leading Change*, Boston: Harvard Business School Press.

¹⁸ This should not be too difficult in view of the potential change in relationships with the business, and the fact that many companies are seriously considering the possibility of outsourcing an increasing number of their corporate services.

¹⁹ Including the proactivity and creativity of people to look for new ways of doing things, i.e., to initiate further change.

well as between departments within a company. It is one of the most important components to establishing change in a successful manner, since it enlarges mutual understanding and common goals resulting in an increased commitment to a patent department 's success.

Additionally, trust enables effective teamwork and brings about a willingness to accept others' opinion and views. This is especially important to a patent department, as patent professionals are generally individualistic people. Trust can therefore ensure that a patent department can learn from the mistakes (and successes) of its individual patent attorneys, since it will encourage them to share experiences to the benefit of all involved. This does, of course, not only apply to a patent department internally; it should also be part of the relationship with the business.

WHY SHARE THIS?

We are entering the era in which the sharing of knowledge and technology will be crucial to companies.²⁰ The "not invented here" attitude will belong to the past. By sharing knowledge and technology, not only will the companies involved benefit, but so will society at large. The same principle applies to the sharing of knowledge regarding the management of patent assets, and that should not be too difficult to do for patent professionals, should it? After all, that is what patents are all about. They provide people a monopoly right for a limited period of time, and in turn ,those people share knowledge regarding an invention with the public, thus enabling society to benefit from the invention too.

© *Lex van Wijk* 2000.

²⁰ See Russell L Parr and Patrick H Sullivan (1996), *Technology Licensing, Corporate Strategies for Maximizing Value*, pp. 3-9. New York: John Wiley & Sons, Inc.