Part 1 | Introduction to Strategic Management

Chapter 1 | Management as a Function and as an Institution

Management as a function

Management as a function is a group of activities and tasks designed to reach goals within organizations with division of labor.
Companies are complex organization with people who must interact to communicate and reach common objectives. People have a strong tendency to believe that there is a simple linear correlation between the input that goes into a business system and the achieved output (e.g. corporate performance). This trivial linear thinking leads to many problems in the organization of businesses, projects, and within processes.
When a project is delayed, a typical reaction of unexperienced managers is to simply put more people on the project. But due to communication inefficiencies, rising complexity, training needs and additional organization structures, these additional resources will not solve the problem, but may even make it worse.
The learning from empirical data is that higher inputs do not automatically lead to a higher output. The performance of different companies with comparable inputs can be significantly different.
Due to differences in the effectiveness of management, companies with comparable inputs perform differently. One example is the number of communication lines within a company. The complexity of communication structures rises with number of employees. Four employees have six possible communication lines. 100 employees have 4950 potential relations. This makes it so important for corporations to be well organized in order to gain efficiency and effectiveness. A good example for big organizations requiring strong management are building sites like the project that built the pyramids. So, management is not a new phenomenon, but rather an ancient and long-standing issue.
Management can be seen as a process of achieving goals and objectives effectively and efficiently through and with people.

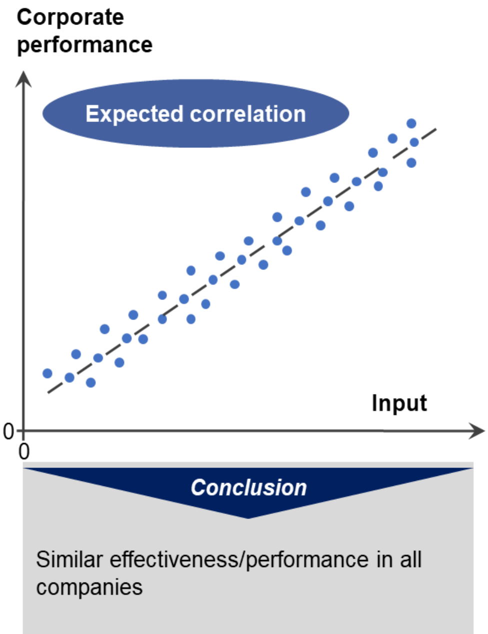

Figure 1: Ideal linear relation between input and corporate performance for all companies

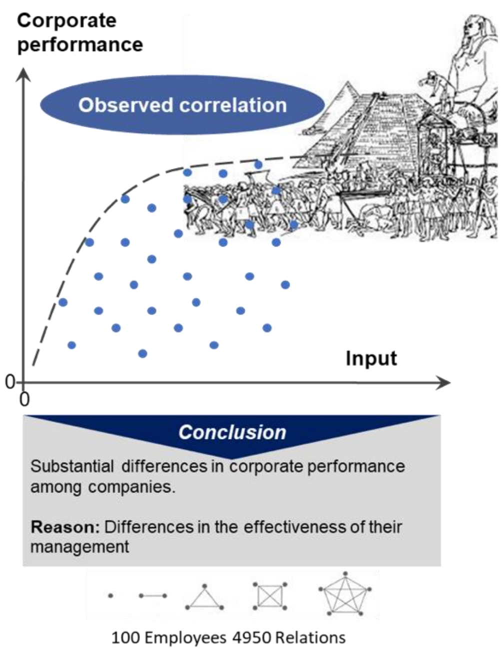

Figure 2: Empirical observations show the effect of management in companies.

Management also affects the framework in which work takes place. It can be seen as a process of designing and maintaining an environment in which individuals work together to accomplish selected objectives effectively and efficiently.
"Process", in this respect, means ongoing functions or a set of activities engaged in by managers. "Efficiency" means getting the most output from the least amount of inputs and is concerned with means – in short: doing things right. "Effectiveness" is the ability of completing activities in such a way that organizational goals are attained and is concerned with ends – in short: doing the right things.

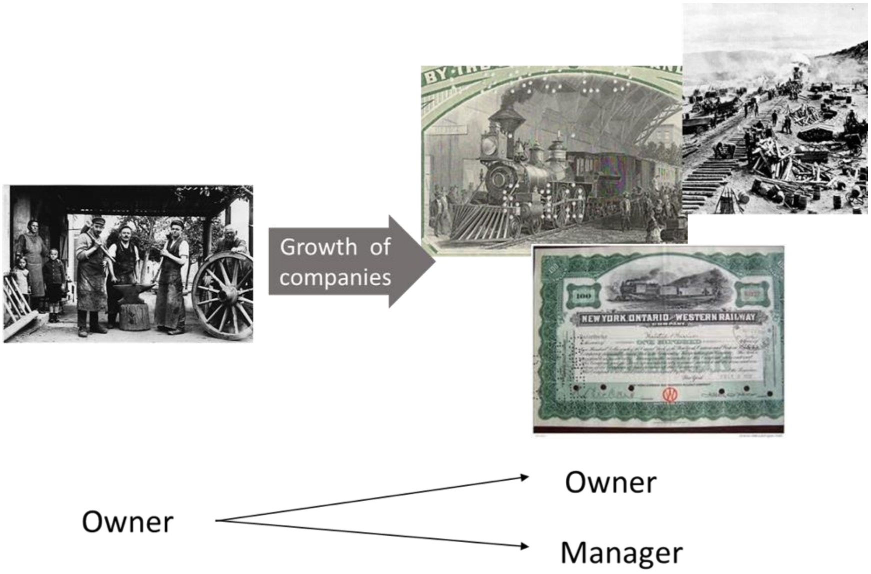

Figure 3: Growth of companies leads to the separation of ownership and management within companies and the introduction of professional managers.

Management comprises the processes of planning, organizing, leading, and controlling the work of the members of an organization, and of using all available organizational resources to reach stated organizational goals.

Management as an institution

Management as an institution is an individual or a group of individuals, who has the power of direction and the obligation to meet the corporate objectives (typically to generate financial returns from projects). Managers are the leaders of a company. The rise of managers as an institution is a consequence of the separation of ownership and control. This refers to the phenomenon within publicly held business corporations, in which the shareholders possess little or no direct control over management decisions.
Investors are a major source of funding for new or expanding operations. As companies have grown, their need for funds has grown, which has led to the legal ownership of companies becoming widely dispersed. In large American corporations, for example, shareholders may run into hundreds of thousands and even more. Although large blocks of shares may be held by wealthy individuals or institutions, the total amount of stock in these companies is so large that even a very wealthy person is unlikely to own more than a small fraction of it. Large American corporation stocks, for example Apple, reached steadily the highest absolute growth of stocks exchange value of the world in 2017. Consequently, has also returned cash to shareholders, handed back
29 billion US$ to investors in dividends and repurchased shares in year 2016. The Stock Exchange Value of Market Capitalization is the multiplication of the Share Price and the Quantities of Shares.

From corporation to capital allocation can be mentioned for example the American railroad. The investors are represented by the corporation and they possess the capital in form of shares. The investors aim to gather fresh capital through the Stock Exchange Market. They are the owners of the company.
The executive board has the tasks to manage the company. Ownership and management are two different factors in the realization of projects.

Chapter 2 |Formulating a Strategy – The Evolution of Strategic Management

The history of strategic thinking

The origins of modern strategic thought can be traced back to classical war strategists. An examination of their works shows that the basic questions they have had to deal with over the past two centuries have been remarkably constant. There are strategic principles that hold true for all times, irrespective of technological or strategic change. Not only that, but history can also help us to clarify and understand contemporary issues. To understand the present and the future, we need to understand the past, because events do not take place in a vacuum, but have their roots in history. Our modern understanding of strategic management has been shaped by military conflicts and events. Indeed, the word strategy has its roots in warfare. The Greek noun strategos means "army leader" and the idea of stratego, from which the word strategy is derived, refers to defeating an enemy by using resources effectively.

The beginnings of strategy can be traced back to The Art of War by Sun Tzu. The book covers all aspects of waging war, and provides copious amounts of strategic and philosophical advice which is still being used as a source of inspiration for politicians and business leaders. The same holds true for On War by Carl von Clausewitz, a major general in the German Prussian army. Interestingly, both books extensively cover how to avoid war. One of Sun Tzu's ideas which has numerous business applications is that winning a battle without fighting is the best way to win. One could apply this recommendation to understanding the strategic behavior of Apple in the personal computer market, for instance. Typical computer manufacturers like Acer, Lenovo, or Toshiba compete with each other with more or less identical machines, primarily based on price. This leads to a price war that undermine the company's profits. In contrast, Apple implements unique features in the software and hardware integrated in its products, and charges bold prices for it. Apple does not even worry much about compatibility with others. And yet, Apple has managed to achieve a fiercely loyal set of customers who are willing to pay premium prices. Apple avoids the price war with other computer manufacturers and wins in its own style, and in its own unique market, by attracting loyal and financially strong customers.

Formulating a strategy

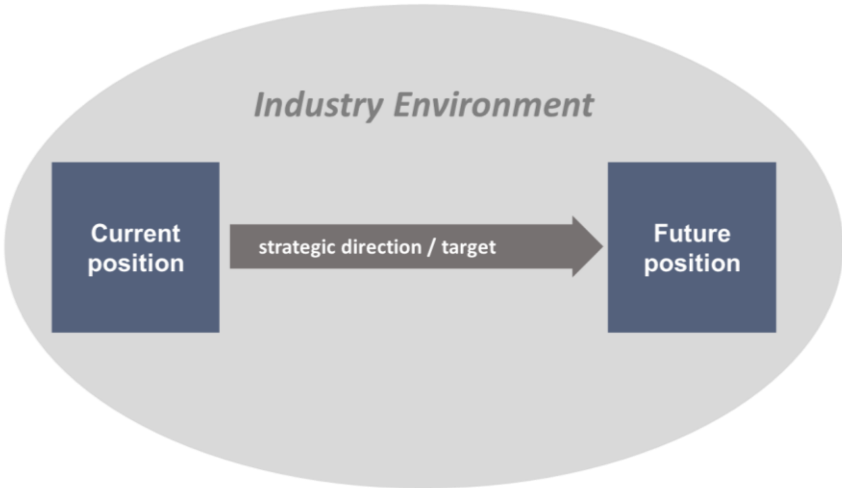

Figure 4: The formulation of a strategy means to analyze the current position of a company and the future position that should be reached and define a bundle of measures to reach that specific target.

Strategic management involves the formulation and implementation of the major goals and initiatives taken by a company's top management on behalf of its owners, based on a consideration of resources and an assessment of external environments in which the organization competes. Analysis takes two general directions: the external environment, which includes customers and competitors, and the internal environment (i.e. the organization itself and its resources). This analysis provides the basis for developing a strategy. A strategy explains how to achieve a specific objective, especially over a longer time period. It can be defined as a pattern in a stream of decisions, which makes it different from planning. Organizations develop strategies to take them from where they are to where they want to be. A strategy helps an organization to reach its maximum level of effectiveness in achieving its goals, while constantly allowing it to monitor its achievements and its environment in order to adapt the strategy and its implementation when necessary. Strategy formulation is the process of developing a strategy – and the process, by which an organization chooses the most appropriate courses of action to achieve its defined goals. This process is essential to an organization's success, because it provides a framework for the actions that lead to the anticipated results.

The evolution of strategic management

The objective of strategic management is to achieve an alignment of corporate policies and practice with strategic priorities. Strategic management provides an overall direction for the enterprise and involves specifying the organization's objectives, developing policies and plans designed to achieve these objectives, and allocating resources in order to implement the plans. The key question of strategic management is: "Why do some firms outperform other firms?". Strategic management examines how actions and events involving executives like Steve Jobs, firms like Apple, and industries like the tablet pc market influence a firm's success or failure. Since the end of World War II, different key issues have fueled the strategic debate in firms and the scientific literature. These issues change over the time, because of the ongoing change and evolution of the political, technological, social, and economic environments of firms. After World War II, the economic framework conditions were supply-driven. In a supply-driven market, consumers largely take whatever and as much as they are offered, because of a shortage in supply. In a supply-driven market, innovation is due to improve the supply with goods and services. With the rising productivity in the OECD countries, the economic framework changed to a demand-driven market environment in those regions in the 1970s. In a demand-driven market, consumers are picky and choosy, and producers have to please them at all costs. More and more innovation is a key instrument for creating new demand.

	Supply-driven economy		Demand-driven economy			
Period	**1950s**	**1960s - early 1970s**	**late 1970s - mid 1980s**	**late 1980s - 1990s**	**early 2000s**	**present**
Dominant theme	-Budgetary planning and control	-Corporate planning	-Positioning	-Competitive advantages	-Strategic and organizational innovation	-Intellectual property management
Main issues	-Financial control	Planning growth, especially diversification and portfolio planning	-Selecting industries and markets -Positioning for market leadership	-Focusing strategy around sources of competitive advantages -New business development	-Reconciling size with flexibility and responsiveness	-Creating and sustaining competitive advantages with IP
Principal concepts and techniques	-Financial budgeting -Investment planning -Project appraisal	-Long-term forecasting -Corporate planning techniques -Synergy	-Industry analysis -Segmentation -Experience curves -PIMS analysis SBUs -Portfolio planning	-Resources and capabilities -Shareholder value -Knowledge management -Information technology	-Cooperative strategies -Competing for standards -Complexity and self-organization -Corporate social responsibility	-IP-based business models -IP strategy development - Interdisciplinary concepts
Organizational implications	-Systems of operational and capital budgeting become key mechanisms of coordination and control	-Creation of corporation planning departments and long-term planning processes -Mergers and acquisitions	-Multidivisional and multinational structures -Greater industry and market selectivity	-Restructuring and reengineering -Refocusing -Outsourcing -E-business	-Alliances and networks -New models of leadership -Informal structures -Less reliance on direction, more on emergence	- Interdisciplinary teams - Resilience - Open innovation - Global IP organizations

Figure 5: Change of the economic framework from the 1950s to the present, adapted from Grant (2005) Contemporary Strategy Analysis

Chapter 3 | Formulating a Strategy and Its Role for Success

Formulating a strategy

Strategy formulation is an analytical and creative process alike. It is a process because particular functions are performed in a sequence over a period of time. The process involves a number of activities and their analysis to arrive at a decision. Although the concept of the process is of course specific to each company, it can also be understood as a comprehensive formulation and implementation process.

Figure 6: Strategic Management consists of three phases: The strategy analysis, the strategy formulation and the strategy implementation

It is useful to consider strategy formulation part of a strategic management process comprising three phases: analysis, formulation, and implementation. Strategic management is an ongoing process aimed at developing and revising future-oriented strategies which allow an organization to achieve its objectives while taking into account its capabilities, constraints, and the environment in which it operates.

Strategic analysis includes:

(a) performing a situation analysis, i.e. an analysis of the internal environment of the organization. This comprises the identification and evaluation of current mission, strategic objectives, strategies, and results, plus major strengths and weaknesses;

(b) furthermore, the organization's external environment is analyzed, including major opportunities and threats;

(c) in addition, the major critical issues have to be identified, which are a small set (typically two to five) of major problems, threats, weaknesses, and/or opportunities requiring particular attention from management.

Formulation, the second phase in the strategic management process, produces a clear set of recommendations (with supporting justification), which necessitates a revision of the mission and objectives of the organization, and supplies the strategies for accomplishing

them. In the course of the formulation, the attempt is made to modify the current objectives and strategies in ways to make the organization more successful. This includes trying to create sustainable competitive advantages, although most competitive advantages are steadily eroded by the efforts of competitors.
A good strategy should be effective in solving the stated problems. This means it can be implemented in the given situation using the available resources. This has to be feasible within a reasonable time frame and in a cost-effective manner. It should not be overly disruptive and has to be acceptable for the key stakeholders in the organization. It is important to consider fits between resources plus competencies with opportunities, and also fits between risks and expectations.

There are four primary steps in this phase:

- Reviewing the current key objectives and strategies of the organization, which usually would have been identified and evaluated as part of the diagnosis.
- Identifying a broad range of strategic alternatives to address the three levels of strategy formulation outlined below, including but not limited to dealing with critical issues.
- Performing a balanced evaluation of the advantages and disadvantages of the alternatives relative to their feasibility plus expected effects on the issues and contributions to the success of the organization.
- Deciding on the alternatives that should be implemented or recommended.

In organizations, and in the practice of strategic management, strategies must be implemented to achieve the intended results. The most wonderful strategy in the history of the world is useless if it is not successfully implemented. This third and final stage in the strategic management process involves developing an implementation plan and then doing whatever it takes to make the new strategy operational and effective in achieving the organization's objectives.

Differences between strategy formulation and strategy implementation

For the successful execution of a strategy, it is important to differentiate between strategy formulation and strategy implementation. The major differences between strategy formulation and strategy implementation are summarized below:

- Strategy formulation refers to designing the strategy, while strategy implementation means executing the chosen strategy.
- Strategy formulation tends to allocate all forces before an action takes place, while strategy implementation focuses on managing these forces during execution.
- Strategy formulation is a logical process, whereas strategy implementation is an operational process.
- Strategy formulation puts emphasis on effectiveness, but strategy implementation focuses on efficiency.

- Strategy formulation is the responsibility of top management. Conversely, middle management is responsible for strategy implementation.
- In contrast to strategy implementation, for which motivational skills are needed, strategy formulation requires intuitive skills. Strategy formulation is an entrepreneurial activity. Strategy implementation, on the other hand, is an administrative activity.
- Strategy formulation is related to planning, but strategy implementation is concerned with acting.

Strategy is a link between the firm and its environment

Strategic Fit: *A successful strategy must be consistent with the firms external and internal environment*

Figure 7: A strategy has to take into account both the internal environment of the firm and the external environment of the industry. A strategy is a link between those two environments and a successful strategy must fit both the external and the internal environment. Adapted from Grant (2005) Contemporary Strategy Analysis.

The role of strategy for success

Strategy is a link between the firm and its goals and values, resources and capabilities, structures and systems, and its environment consisting of competitors, customers, and suppliers. A successful strategy must be consistent with these two environments. This consistency is called strategic fit. It means that a company needs the necessary resources and capabilities to execute and support a certain strategy. It also means that a given set of resources and capabilities limits the potential strategies which can be realized by the firm. Strategic fit can be used actively to evaluate the current strategic situation of a firm as well as opportunities to compensate current deficiencies in a given strategy.
The underlying logic of strategy is based in its martial heritage: strategy is about winning. In other words, strategy is about winning against competitors or conquering new markets. Strategy is not planning. A strategy is not a detailed plan of actions. It is more of a unifying

theme which gives coherence and direction to decisions and actions of individuals and organizations.
Even if successes are always idiosyncratic events, three common elements of successful strategies can be observed. Firstly, strategies describe long-term, simple, and agreed objectives. Secondly, strategies are based on a profound understanding of the competitive environment, and thirdly, strategies are based on a rigorous and objective appraisal of resources. In addition, in order for strategies to lead to success, it is necessary to execute the strategy in an effective manner. Implementation is the process that turns strategies and plans into actions in order to accomplish strategic objectives and goals. Implementing a strategy is as important, or even more important, than developing a strategy.

Common elements in successful strategies

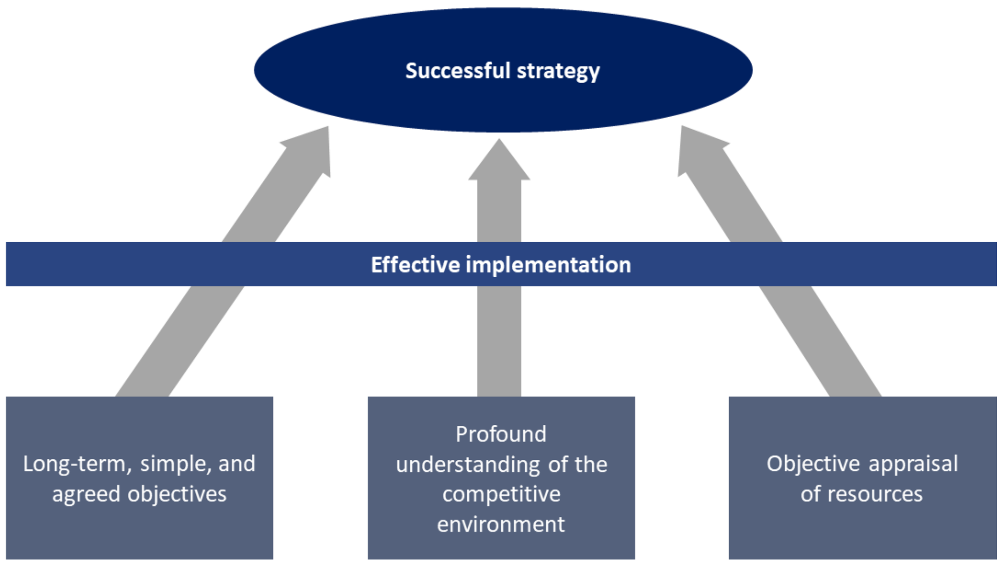

Figure 8: Successful strategies have some common elements. These elements are long-term, simple and agreed objectives, a profound understanding of the competitive environment and the objective appraisal of resources. These elements must be implemented effectively into the strategy to make it successful. Adapted from Grant (2005) Contemporary Strategy Analysis.

Strategy has different roles within the strategic management:

- Decision support: strategy simplifies decision making by limiting the range of alternatives.
- Coordination: strategy making is an important process that concerns the entire organization.
- Target: Strategy is forward-looking. It is concentrated not only with how to compete now but where the company is going in the future.

Chapter 4 | Strategy and Organization – IP as a Functional Strategy

Sources of superior profitability: corporate or business strategy

To understand strategic thinking, it is helpful to look at it from an investment perspective. For an investment to be worthwhile, the expected return on capital has to be higher than the cost of capital. Given a number of competing investment opportunities, investors are expected to put their capital to work in order to maximize the return. The cost of capital is the cost of a company's funds, both debt and equity. This perspective is used to evaluate investment alternatives related to projects, businesses, or strategies.
In essence, companies are looking for their profitability to exceed the average profitability in a given economic environment. This is called superior profitability. Taking into account the strategy level, we can distinguish between two different sources of superior profitability: industry attractiveness and competitive advantage.

Industry attractiveness and corporate strategy

Industry attractiveness means the magnitude and ease of making profits in comparison with the risks involved in a specific industrial sector. Industry attractiveness is measured by the net ratio of competitive intensity, and the industry's long-term potential for growth in sales and profits. Greater competitive intensity reduces the attractiveness of the industry. Greater long-term potential for growth increases the attractiveness of the industry.
Competitive intensity is measured by the collective strength of Porter's five forces of competition: rivalry among existing firms in the industry; the threat of new entrants; substitute products that cap prices current rivals can charge; and the bargaining powers of suppliers and customers. This will be discussed in more detail in Part 2 of this course: Strategy Analysis – Market Based View.
The corporate strategy must provide an answer to the question: Which industries should we be in?

Competitive advantage and business strategy

A company has a competitive advantage over its rivals when its profitability is greater than the average profitability of all companies in its industry. It has a sustained competitive advantage when it is able to maintain above-average profitability over a number of years. The presence of a competitive advantage is desirable for business, but not every competitive advantage is equal.
The strength of the competitive advantage and the risks the business needs to protect itself against are largely dictated by the type of competitive advantage the business enjoys. To understand the sustainability and strength of a business's competitive advantage, it is necessary to identify the sources of the competitive advantage. These sources dictate to a large extent which competitive strategies the business needs to pursue. Superiority is

achieved when an organization can provide the same value as its competitors but at a lower price, or when it can charge higher prices by providing greater value for its customers through differentiation. The business strategy must provide an answer to the question: "How should we compete based on our competitive advantages?"

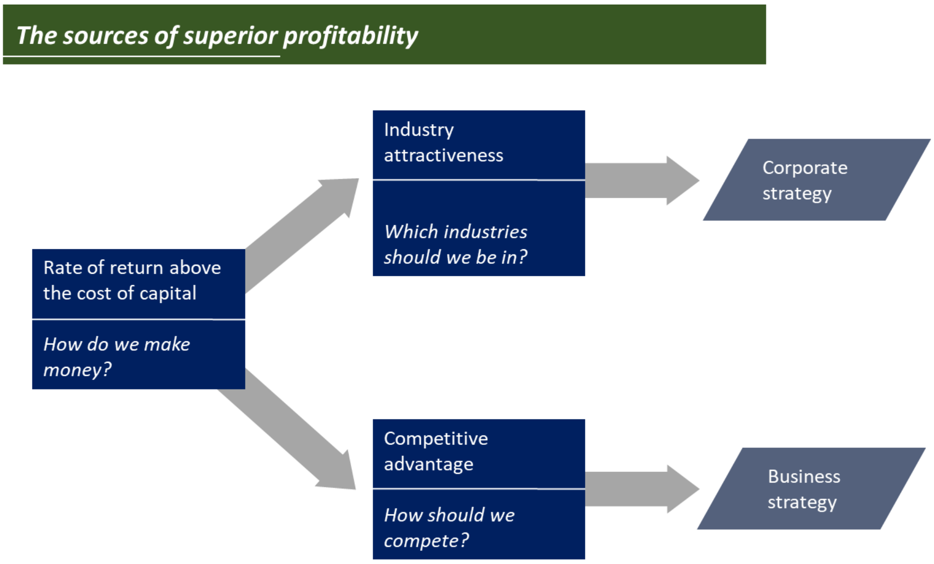

Figure 9: There are two sources of superior profitability for a business, i.e. the industry attractiveness and the competitive advantage. The corporate strategy must give an answer to the question: Which industries should we be in based on the industry attractiveness? And the business strategy must give an answer to the question: How should we compete based on our competitive advantages? Figure adapted from Grant (2005) Contemporary Strategy Analysis

Organizational hierarchy of strategies

Corporate strategy determines the overall scope and direction of a corporation, and the way in which its various business operations work together to achieve particular goals. Corporate strategy determines the business a company is in. Business strategy determines how the firm is competing in its business. Functional strategies are the third hierarchical level of strategic thinking within an organization. Each functional area or department is assigned specific goals and objectives to achieve in order to support the higher-level strategies. Functional strategies specify outcomes to be achieved in the daily operations of specific departments or functions. Functional strategies reflect that strategic objectives typically require the involvement of multiple functional areas, including departments, divisions, and branches.
Within this meaning, IP strategy is a functional strategy which must support and back business strategy and corporate strategy. It has to reflect corporate and business objectives, and take into account the industry a company is in, the way in which the company competes with its rivals, and how the company does business. In other words, an IP strategy must explain what IP can achieve for the business and how the different functions of the firm must work together to meet these objectives. An IP strategy must make transparent how to reach specific business objectives. The strategy has to be implemented and controlled. The success of the IP strategy must be measurable in business figures.

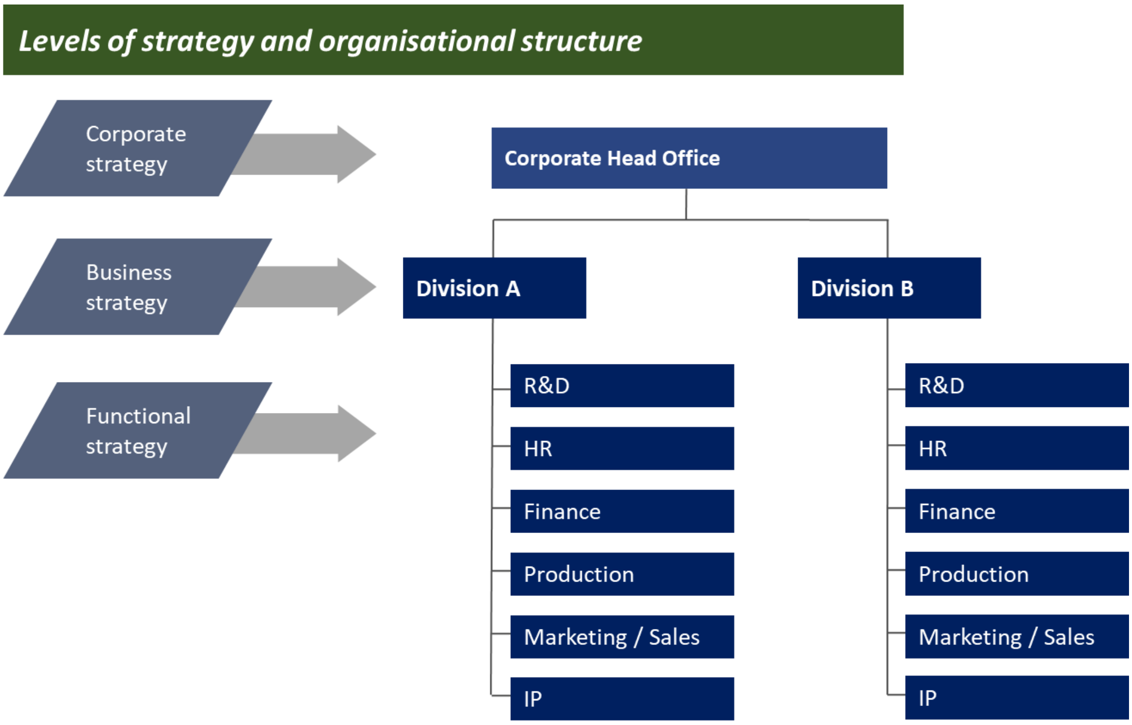

Figure 10: The third structural level of a strategy next to the corporate and business strategy is the functional strategy. The functional strategy must be aligned with the corporate and business strategy and must support the different functional areas, departments and divisions of a company to reach the strategic objectives. Adapted from Grant (2005) Contemporary Strategy Analysis.

Chapter 5 | Competitive Advantages – Sources of Success

The concept of competitive advantage

A competitive advantage is an attribute that allows a company to outperform its competitors. Competitive advantages allow a company to achieve superior margins compared to its competition, and to generate value for the company and its shareholders. In this context, operating margin is equal to operating income divided by revenue. Operating margin is a profitability ratio measuring revenue after covering operating and non-operating expenses of a business.
A competitive advantage is simply a factor that distinguishes a business from others and makes customers more likely to choose its products over the competition. Without a competitive advantage, a business has no unique method of drawing in customers. A competitive advantage allows a firm can create value for its customers which competitors cannot provide. This may be lower costs, faster service, better customer service, a more convenient location, higher quality, or other factors.
Creating a competitive advantage involves analyzing a business's strengths and those of its competitors, and learning how to take advantage of these factors.
To begin with, a firm has to understand its customers, in particular their real needs, perspectives, cultural background, and what drives the buying decision. To analyze customers, it is helpful to work with personas. Personas are fictional, yet believable archetypes which can be developed to represent target customers. They go deeper than generalized customer segments by having individual names and stories that reflect personal attributes and behavioral characteristics such as needs, motivations, attitudes, and pain points.
In addition, it is necessary to understand firm's unique business strengths. These can include strong employee attitudes, excellent customer service, a large market share, personal relationships with customers, leadership in product innovation, highly efficient, low-cost manufacturing, or high integrity.
Finally, the competition should be analyzed. A competitive analysis is a critical part of understanding competitive advantages. A list of questions can be used for analyzing the competitive environment:

- Who are the competitors?
- What products or services do they sell?
- What is each competitor's market share?
- What are their past strategies?
- What are their current strategies?
- What are each competitor's strengths and weaknesses?
- What potential threats do our competitors pose?
- What potential opportunities do they provide for our own business?

Types of competitive advantage

Competitive advantage allows a firm to generate superior profitability and returns on investment. This superior profitability is a result of better revenue generation capability, or is driven by a lower cost per unit or a combination of both. Competitive advantages affecting revenue do so either because they endow the business with a captive source of demand or because they provide superior pricing ability. Cost-based competitive advantages are either a result of operational scale or driven by supply advantages, which can be a result of access to low-cost sources of supply. We can distinguish between six typical types of sources of sustainable competitive advantages (SCA):

1. Economies of scale. Economies of scale are the most widely discussed competitive advantage. The basic tenet of economies of scale is that the cost per unit declines as output increases. The lower cost per unit is largely driven by the presence of fixed costs within the business's cost curve. If the economies of scale advantages are easily replicable, such advantages will not lead to SCA.
2. Consumer preference. In some industries, customers strongly prefer certain brands, e.g., of soft drinks, cigarettes, etc. Brand preference can emerge for various reasons, including indicators for the uniqueness or consistency of a product, status symbols, or product quality. However, not all brand preferences lead to SCA. Unless the brand preference endows its owner with pricing power, the competitive advantage of the brand is limited or non-existent.
3. Switching costs. Switching costs serve as another source of SCA as they lead to customer captivity. Switching costs may emerge for a variety of reasons. For example, customers may need to spend a substantial amount of money to switch from one supplier to another, or there may be substantial business implications related to the possible loss of business, or significant inconveniences for the customer's clients. In each of these cases, the customer will be less willing to switch.
4. Network effect. Much like economies of scale, network effect has been widely discussed and frequently employed to justify higher valuations for a variety of businesses. However, we assert that network effect refers to a specific type of competitive advantage that requires specific conditions, including a natural tendency of consumers/customers to gravitate towards the largest company, and that every time a new user/customer joins the network, all users are better off as their access increases and/or the cost per user declines.
5. Mission criticality. A much less discussed form of competitive advantage is what we refer to as mission-critical suppliers or service providers. In general, these are niche businesses that have built a strong reputation as reliable providers of products or services fulfilling mission-critical requirements their customers.
6. Low-cost supply. Lastly, certain businesses have greater access to low-cost supply sources than their competitors. Such advantages are different from economies of scale because they are driven by favorable sources of supply rather than by the scale of operations. Such competitive advantages are especially relevant in cases where the supply of the product or commodity in question is limited.

These sources of competitive advantage are not mutually exclusive. On the contrary, the existence of a dominant source of competitive advantage frequently gives rise to another ancillary competitive advantage. For example, the dominant competitive advantage enjoyed by Coca-Cola enjoys is related to consumer preference, which manifests itself in the revenues side of the company's economics by providing a captive source of consumer demand, and provides it with strong pricing power. However, the wide acceptance of the product gives rise to an ancillary competitive advantage: economies of scale in distribution. This cost advantage allows The Coca-Cola Company to outsell several other products where consumer preference is not as strong.

Developing objectives for strategies

Objectives are what organizations want to accomplish, i.e. the end results they want to achieve within a given time frame. In addition to being accomplished within a certain time frame, objectives should be realistic (achievable) and measurable. "To increase sales by 2 percent by the end of the year" is an example of an objective an organization might set itself.
Objectives help to guide and motivate a company's employees and give its managers reference points for evaluating the firm's marketing actions. Although many organizations publish their mission statements, most for-profit companies do not publish their objectives. Accomplishments at each level of the organization have helped PepsiCo meet its corporate objectives over the course of the past few years. PepsiCo's business units (divisions) have increased the number of their facilities to grow their brands and enter new markets. PepsiCo's beverage and snack units have gained market share by developing healthier products and products that are more convenient to use.
A firm's marketing objectives should be consistent with the company's objectives at other levels, such as the corporate and business level. An example of a marketing objective for PepsiCo might be "to increase the market share of Gatorade by 4 percent by the end of the year." The ways in which firms analyze their different divisions or businesses will be discussed later in the chapter.

Strategies and tactics

Strategies are the means to an end, the game plan, or what a firm is going to do to achieve its objectives. Successful strategies help organizations establish and maintain a competitive advantage competitors cannot easily imitate. Tactics include specific actions taken to execute the strategy, for example in marketing, such as coupons, television commercials, banner ads, and so on. PepsiCo attempts to sustain its competitive advantage by constantly developing new products and innovations, including "mega brands," which include nineteen individual brands that generate over $1 billion in sales each. The tactics for each of these brands may consist of specific actions like commercials during the Super Bowl, coupons, BOGOF promotions, etc.
Firms often use multiple strategies to accomplish their objectives and capitalize on opportunities. For example, in addition to pursuing a low-cost strategy by selling products inexpensively, Walmart has simultaneously pursued a strategy of rapidly opening new stores

around the world. Many companies develop marketing strategies as part of their general overall business plans.

Strategy objectives

The objectives of strategy are

competitive advantages

over rival firms and how

supranormal returns

can be realized to maximize profits.

Formal definition:
When two or more firms compete within the same market, one firm has a competitive advantage over its rivals when it earns (or has the potential to earn) a persistently higher rate of profit.

Formal definition:
Returns above average market returns.

Figure 11: Strategy objectives are targets, which companies want to accomplish, for example having competitive advantages over rival firms and having supranormal returns. Strategies are the means to accomplish these strategy objectives. Source: "*Bowman, E. H. (1974): Epistemology, corporate strategy and academe, in: Sloan management Review, pp. 35-50; Rumelt, R. P./Schendel, D./Teece, D. J. (1991): Strategic management and economics, in: Strategic Management Journal, pp. 5-29.*"

General model of competitive advantages

There is no single answer for what is competitive advantage or one single way of measuring it. And that is for a good reason. Nearly everything can be considered a competitive edge, e.g. higher profit margins, greater returns on assets, valuable resources such as brand reputation or unique competence in producing jet engines. Every company must have at least one advantage to successfully compete in the market. If a company is unable to identify one or simply does not possess one, competitors will soon outperform it and force the business out of the market.

There are many ways to achieve an advantage, but only two basic types of competitive advantage: cost or differentiation. A company that manages to achieve superiority in terms of cost or differentiation is able to serve its consumers at a lower cost or with products which possess a higher degree of differentiation. And, most importantly, such companies are able to compete with their rivals.
An organization that is capable of outperforming its competitors in the long term has a sustainable competitive advantage.
The following diagram illustrates the basic competitive advantage model, which is explained in the article below:

How can a competitive advantage be achieved?

An organization can achieve an edge over its competitors in the following two ways:

- **Through external changes**. When PEST factors change, many opportunities can appear that, if seized, could provide a number of benefits for an organization. A company can also gain an upper hand over its competitors when it is capable of responding to external changes faster than other organizations.
- **By developing them inside the company**. A firm can achieve cost or differentiation advantages when it develops VRIO resources, unique competences, or through innovative processes and products.

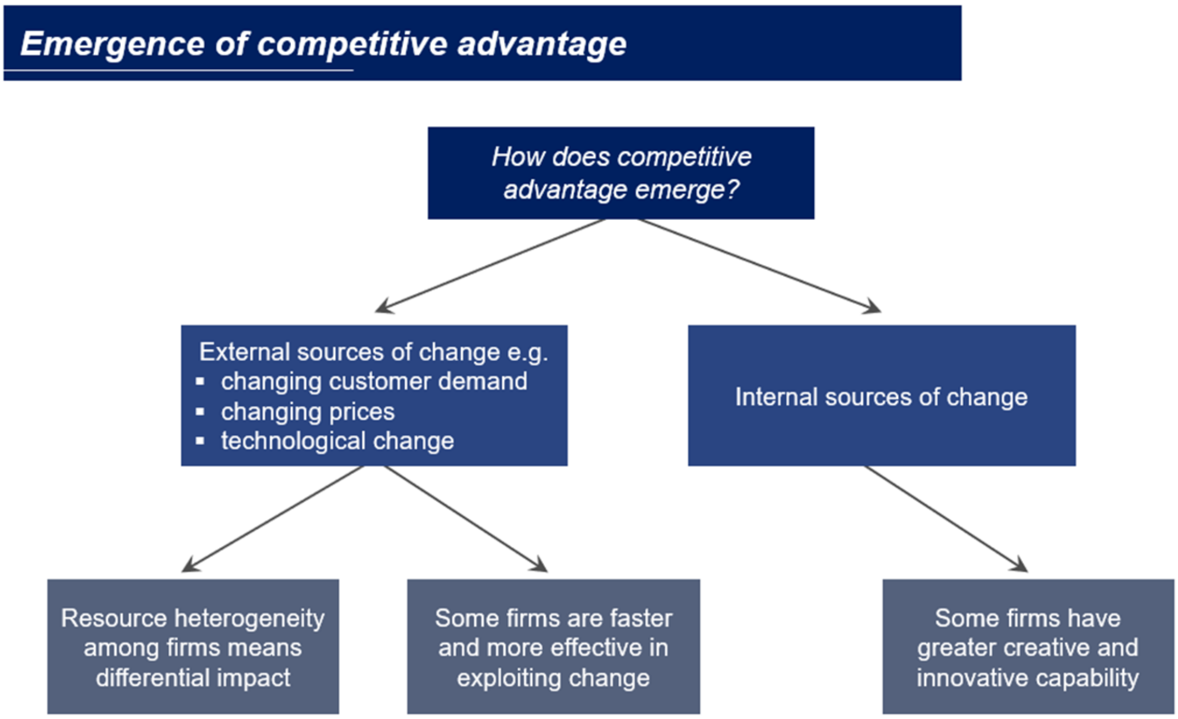

Figure 12: Competitive advantages can emerge inside and outside of the company. External sources can be the changes of customer demand, prices or technologies and successful companies can profit from the resource heterogeneity in the market or from their ability to adapt faster to changes. Competitive advantages from internal sources can arise, when a company is especially innovative. Source: *Grant (2005) Contemporary Strategy Analysis*

External changes

Changes in PEST factors. PEST stands for political, economic, socio-cultural, and technological factors affecting a firm's external environment. When these factors change, many opportunities arise that can be exploited by an organization to achieve superiority over its rivals. For example, new superior machinery manufactured and sold in South Korea would only result in lower production costs for Korean companies and they would gain a cost advantage over their global competitors. Changes in consumer demand, such as the trend towards eating healthier food, can be used to gain at least a temporary differentiation

advantage if a company opts to sell primarily healthy food products while its competitors do not (e.g. Subway and KFC).
If opportunities arise due to changes in the external environment, why do not all companies benefit from them? The answer is simple: companies have different resources, competences, and capabilities, which is why they are affected by changes in their industry or macroenvironment to different extents.
Ability to respond to changes fast. An advantage can also be gained when a company is first to exploit an external change. Conversely, if a company is slow to respond to changes, it may never benefit from opportunities that arise.

Internal environment

VRIO resources. A company that possesses VRIO (valuable, rare, hard-to-imitate, and organized) resources has an edge over its competitors due to the superiority of such resources. If one company has gained a VRIO resource, no other company can acquire it (at least temporarily). The following resources have VRIO attributes:

- Intellectual property (patents, copyrights, trademarks)
- Brand equity
- Culture
- Know-how
- Reputation

Unique competences. Competence is an ability to perform a task successfully and is a cluster of related skills, knowledge, capabilities, and processes. A company that has developed a competence in producing miniaturized electronics would gain at least a temporary advantage as other companies would find it very hard to replicate the processes, skills, knowledge, and capabilities needed for that competence.

Innovative capabilities. Most often, companies achieve superiority through innovation. Innovative products, processes, or new business models provide a strong competitive edge based on a first mover advantage: e.g. Apple's introduction of tablets, or its business model combining an MP3 device and the iTunes online music store.

Porters basic types of competitive advantage.
M. Porter has identified 2 basic types of competitive advantage: cost and differentiation advantage.

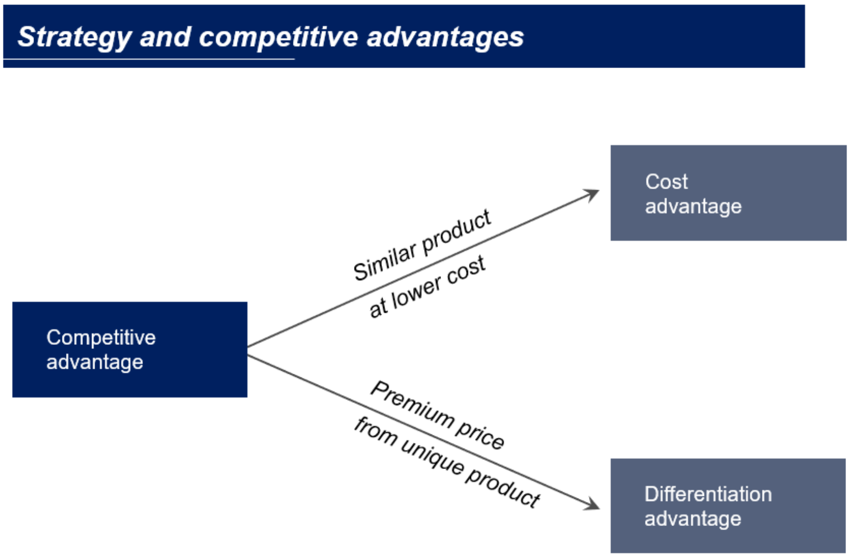

Figure 13: The two types of competitive advantage by Porter are the Cost advantage gained through a production with lower costs and the Differentiation advantage gained through a premium price for unique products or services. Source: *Grant (2005) Contemporary Strategy Analysis*

Cost advantage. Porter argued that a company could achieve superior performance by producing similar quality products or services but at lower costs. In this case, the company sells products at the same price as its competitors, but reaps higher profit margins because of lower production costs. Companies trying to achieve a cost advantage (like Amazon.com) pursue a cost leadership strategy. Higher profit margins lead to further price reductions, greater investment in process innovation, and ultimately greater value for customers.

Differentiation advantage. A differentiation advantage is achieved by offering unique products and services, and charging premium prices for them. A differentiation strategy is used in this situation, and the company positions itself more towards branding, advertising, design, quality, and new product development (see Apple Inc. or even Starbucks) rather than efficiency, outsourcing, or process innovation. Customers are willing to pay higher prices only for unique features and top quality.

The cost leadership and differentiation strategies are not the only strategies used to gain a competitive advantage. An innovation strategy is used to develop new or better products, processes, or business models that grant a competitive edge over competitors

Chapter 6 | IP strategies and Industries

Defining industries and sectors

In management and economics, at least two definitions are used for the "industry" term: (1) The manufacturing or technically productive enterprises in a particular field, country, region, or economy viewed collectively, or one of these individually. A single industry is often named after its principal product; for example, the auto industry. For statistical purposes, industries are generally categorized according a uniform classification code such as the Standard Industrial Classification (SIC); (2) Any general business activity or commercial enterprise that can be isolated from others, such as the tourist industry or the entertainment industry.

The "industry" and "sector" are often used interchangeably to describe a group of companies that operate in the same segment of the economy or share a similar business type. Although the terms are commonly used interchangeably, they do, in fact, have slightly different meanings. This difference pertains to their scope: a sector refers to a large segment of the economy, while the "industry" describes a much more specific group of companies or businesses.

A sector is one of a few general segments of the economy within which a large group of companies can be categorized. An economy can be broken down into about a dozen sectors, which can describe nearly all of the business activity in that economy. The basic materials sector, for example, is the segment of the economy, in which companies deal in the exploration, processing, and selling of basic materials such as gold, silver, or aluminum, which are used by other sectors of the economy.

An industry, on the other hand, describes a much more specific grouping of companies with highly similar business activities. Essentially, industries are created by further breaking down sectors into more defined groupings. Each of the dozen or so sectors will have a varying number of industries, but it can be in the hundreds. The financial sector, for example, can be broken down into industries such as asset management, life insurance, or brokerage.

When breaking down an economy, the first groups are sectors which describe a general economic activity. Then all of the companies that fall into a specific sector are categorized further into industries where they are grouped only with companies with which they share very similar business activities. This is not the end, however. Industries can be further sub-categorized into various, more specific groupings.

It should be noted that one may find situations in which these two terms are reversed. However, the general idea remains: one breaks the economy down into a few general segments while the other further categorizes those segments into more specific business activities.

The "industry" term can be divided into three main categories. Recently, tertiary industries have been sub-divided into a fourth type.

Primary industries extract raw materials (which are natural products) from land or sea, e.g. oil, iron ore, timber, fish. Mining, quarrying, fishing, forestry, and farming are all examples of primary industries.

Secondary Industries, sometimes referred to as manufacturing industries, involve the manufacture of other products from raw materials by manual labor or machines. Secondary industries often use assembly lines, e.g. a car factory.

Tertiary industries, sometimes referred to as service industries, neither produce raw materials nor make products. Instead, they provide services to other people and industries. Tertiary industries can include doctors, dentists, refuse collection, and banks.

Quaternary industries involve the use of high-tech industries. People who work for these companies are often highly qualified within their field of work. Research and development companies are the most common type of businesses in this sector.

All sectors are linked in one way or another. For example: cotton as a raw material is extracted by primary industries. The cotton may then be turned into an item of clothing by the secondary industries. Tertiary industries may advertise the goods in magazines and newspapers. The quaternary industries may me involved in advertising or researching the product to check that the item of clothing meets the standards it claims to meet.

The concept of value chains and markets

A value chain describes the full range of activities firms engage in to bring a product or a service from its conception to its end use and beyond. This includes the entire sequence of value creation, from design to supply with input materials, production, marketing, distribution, post-sales support for the final consumer, and disposal after use, particularly in the context of green and sustainable growth.
The activities comprised in a value chain can be performed by a single firm or divided among different firms. They can be located in a single geographical location, or spread across wider areas and across related and unrelated industries. Value chains from the primary sector supply value chains from the secondary manufacturing sector and beyond, linking industries and sectors of the economy in a complex value system.
There are two fundamental principles associated with value chains: (1) the specialization and division of labor between firms, and (2) the interconnected capabilities across firms linking flows of resources and value added across boundaries. Division of labor is an old and traditional concept used by economists to model the optimization of manufacturing and production process. Business theory has acknowledged that internal specialization and organizational structuring of activities within the firm enhances performance and maximizes efficiency of resource utilization. The same notion of specialization and organizational structuring of activities is also the foundations of value chains. In the same way as economists sought greater efficiency and maximization of resource utilization, strategists are now seeking optimization of value-added processes and flows within and across firms.
Value chain theory explains the internal structuring of activities within firms in two main dimensions: primary activities, or essential and interlinked operations that enable a firm to process inputs into outputs, and secondary activities, or organizational services that support the primary process. The value system concept refers to cross

Value chains contain fragmented, modularized activities across input-output markets and describe interconnected industrial processes. They are typically presented as the sequence of: product (service) design, supply with input materials, production, marketing, distribution, post-sales services to consumers, and disposal after use.

A distinction must be made between markets and industries. A market is made up of individual consumers in B-to-C (business-to-consumer) markets or of individual buying companies in B-to-B (business-to-business) markets. They can be categorized by buying habits, i.e. what attracts them to certain products rather than others. Some markets are driven by fads in other industries, such as teenage apparel inspired by the sports or music industries. The cosmetics market reacts to health and apparel industry trends. Retail distributors are important drivers of market trends as they direct the presentation and availability of certain products over others.

An industry exists to serve a market. If an industry becomes irrelevant to market demands, it will fail. An example is the music recording industry, which used to make most of its revenues from full-length album sales. The new environment of digital single downloads for MP3 players and smartphones resulted in a decline in traditional recording industry revenues and growth driven by market taste rather than industry taste. This is only one reason, but it illustrates a simple problem in which the industry remained devoted to one way of doing business while the market changed.

Strategic IP behavior in different industries

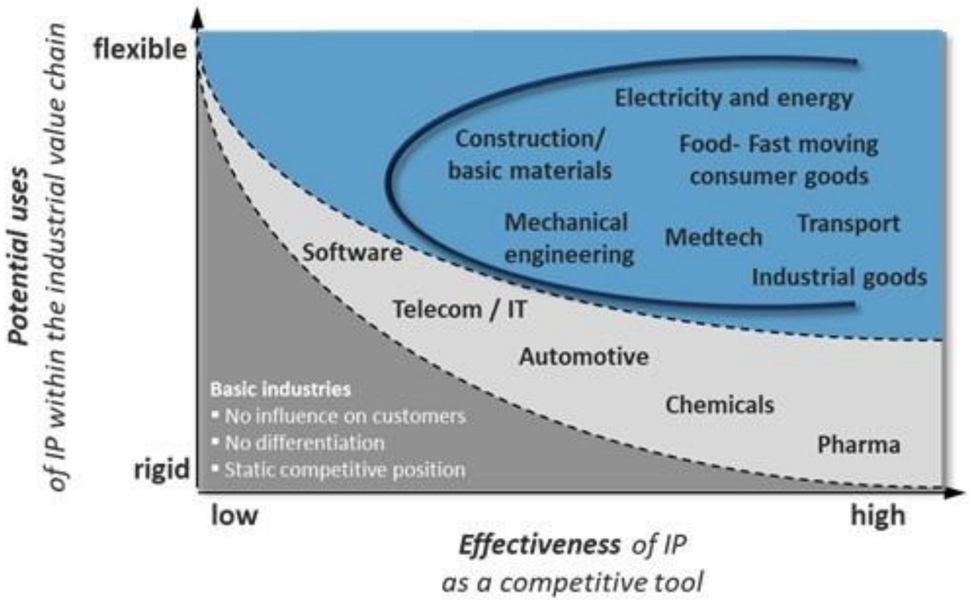

Figure 14: The Strategic IP behavior of a company depends on its industry. This follows from the effectiveness of IP as a competitive tool and potential uses of IP in the value chain. They matrix shows typical positions of the important industries.

With this theoretical and analytical concept, the overall landscape of generic IP strategies within different industries can be understood. Two different characteristics should be distinguished: (1) the potential uses of IP within the respective industrial value chain, and (2) the effectiveness of IP as a competitive tool. The diagram shown is specific to the secondary sector and specific for patents. The same logic could be applied to analyzing copyrights, design rights, and trademarks.

The rigidity of potential uses of IP means that, according to the business logic and specific division of labor along a value chain of an industry, we see quite rigid or rather flexible uses of IP strategies. As an example, the pharma industry has quite a rigid IP regime, because the business logic of the pharma industry prescribes that firms try to claim legal monopolies around their molecules as soon as possible when R&D results become available in order to protect future markets – even if it is unclear at that point in time which will be the blockbuster pharmaceutical. Within the software, IT, and telecoms industries, many different and flexible IP strategies can be observed: from open source to licensing of standards, and embedded monopolies (see "Monopoly-in-a-box" -> IP-Strategy Development: Part 4 Chapter 5).

The effectiveness of IP as a competitive tool differs strongly across industries. While patents are strong weapons within the pharma industry, it is even more complex and sometimes impossible to protect relevant aspects of products or services, detect infringements, and enforce legal positions in the telecoms, IT, and software industries.

With these two independent characteristics, a portfolio can be created which gives an overview over the second sector of an economy with all its different industries. Three different areas can be distinguished in this diagram. The area in the lower left corner is the field of industries in which IP exclusivities have nearly no influence on customer behavior, where differentiation is not available as a competitive advantage, and where competitive positions are rather static. Such areas can be seen in industries which are close to the primary sector or in industries which merely fulfill a production function for other industries.

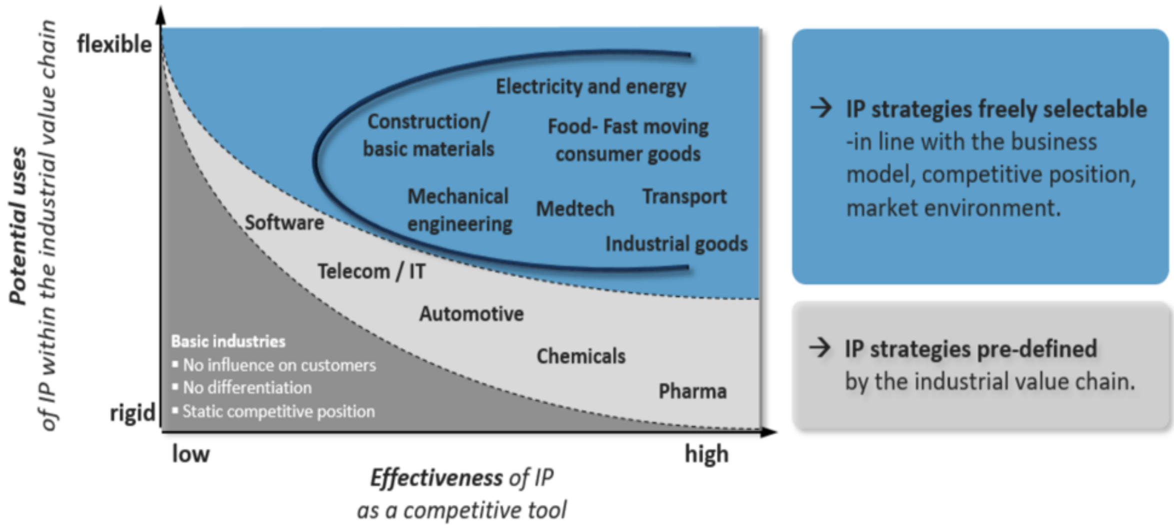

Figure 15: The Strategic IP behavior of a company depends on its industry. Companies from basic industries are in the dark grey area and have low effectiveness and rigid uses of IP. Companies in the light grey area have moderate potential uses of IP in the value chain and moderate to high effectiveness of IP. Those companies from the Pharma to the Software industry can use IP strategies, but they are bound to their industry and their value chain. Companies from the blue area are flexible in the use of IP and can use IP effectively as a competitive tool. They can choose their IP strategy freely and match it with their chosen business model, competitive position and market environment.

In the second segment, we see all industries we know from textbook IP strategies. These industries have been affected by IP for a long time and have developed specific IP strategies which are well documented and practiced (see "Generic IP-Strategies" -> IP-Strategy Development: Part 4). To a certain extent, these IP strategies are prescribed by the structures of the respective value chains, division of labor, different competencies, and business logics in the industries. These IP strategies can be seen as pre-defined by the industrial value chain. As long as no dynamic factors are in force, the IP strategies are static. Especially digital transformation creates a tremendous dynamic force within the different industries and makes it necessary for firms to redefine their IP strategies.
The field in the upper right corner contains all other industries which are not associated with the first and second segment. In these industries, firms have to develop IP strategies which are in line with their business logic, competitive strategy, competitive advantages, competitive position, and market environment.