

Determinants of salary compensation in the Dutch procurement profession



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Preface

I'm glad to present you my lifetime work in academics. It was exciting in the sense that I had the opportunity to do research among such a great population of procurement professionals. The response and results were exciting. On the other hand it was difficult because I had to align three different organizations (InQuest, NEVI¹ and Berenschot), which all participated in this research. If you want to know more about the 'Career and Salary monitor Procurement 2007'² or similar surveys about this topic in the future, please go to www.salarisinkoop.nl. At this site also a predictive procurement salary monitor is posted. This application has been developed by using all data gathered from the 'Career and Salary monitor Procurement 2007' survey. The survey results also have been used for three publications³.

Although, I have spent many years studying at the Erasmus University Rotterdam, I'm glad and eager to end my time as a student formally. Now it's time to put all my theoretical knowledge and personal skills into practice. But before I will do so, I want to thank some people. I'm grateful to Mr. H.P.G. Pennings, my thesis mentor and Mr. J. Delfgaauw, my co-reader, for their help on economic and most of all statistical problems. Furthermore I want to thank Mr. M. Smits van Oyen of InQuest, who gave me practical help in editing the questionnaire and sending out the survey. I'm also grateful to NEVI and Berenschot. Without their help I would not have had such a huge response.

Last but not least I want to thank my family and friends for their support. Especially my wife Janelle and my travel partner and former house mate Wilfred.

Michael van Holsteijn

Rotterdam, December 2008

¹ NEVI is an important Dutch organization which promotes the procurement profession as a whole, by offering training and services to organizations and companies. For more than fifty years, NEVI has promoted the procurement profession. Recently, they have installed several professors at Dutch universities. By doing this, they are able to promote scientific research related to the procurement profession. NEVI has established education institutes, which have developed several procurement trainings and seminars.

² The original Dutch name for this survey is 'Carrière en Salarismonitor Inkoop 2007'.

³ First publication; in a career special enclosed by the Dutch specialist journals Deal! and InLogistiek, June 2007, p. 10-13

Second publication; in the largest Dutch newspaper De Telegraaf, titled 'Inkoopsters hoger opgeleid', June 24th 2007, p. 29

Third publication; in the largest Dutch newspaper De Telegraaf, titled 'Salarisspurt inkoop', July 14th 2007, p. 25

Executive Summary

The Dutch purchasing profession is on the move. The strategic importance of procurement related activities is more and more widely accepted. The responsibilities of purchasing professionals have steadily increased over the last decade. Formerly, procurement departments were often regarded as commercial staff departments. Nowadays this has shifted, which resulted in bigger responsibilities within organizational structures. Also the remuneration of purchasing professionals has increased considerably over the last years. No adequate researches have been done about the determinants of base salary of purchasing professionals working within the Netherlands. This research will reveal several surprising results about procurement professionals' remuneration.

Method

In March 2007 a questionnaire has been sent to 11.857 purchasing professionals by email. The response was fantastic and resulted in a usable data set of 2.171 respondents. The size and scope of such a survey had never been so wide as compared to earlier researches on base salary compensation in the Dutch procurement profession⁴. Most of the respondents (69.1%) were highly educated⁵. Furthermore 45.5% of the respondents were working for large organizations⁶.

Surprising results

No significant difference was found between male and female remuneration. This was most surprising, because in the Netherlands it is often acknowledged that women earn less than men. But the results of the survey indicate that the differences in remuneration of men and women can fully be explained by other personal, functional and organizational characteristics.

In some cases it would be profitable to follow specific procurement education at well known education centres like the NEVI in the Netherlands. Following a NEVI MIL or NEVI 1 course seems to have a negative impact on one's earnings as compared to purchase professionals who did not follow any NEVI education. Following such education could signal low capabilities possibly. On the other hand, following a NEVI 2, NEVI 3 or ISFAH education do

⁴ This response was even higher compared to procurement salary surveys which were conducted over the last years in the US.

⁵ Bachelor degree or higher

⁶ Organizations with more than 1.000 FTE

pay off, respectively +3.0%, +6.9% and +8.7%. Following an APICS education seems to have no effect on one's denoted base salary.

From a labour mobility perspective, it can be stated that every switch from employer within the procurement profession results in a salary increase of 1.3%. Also working abroad has a significant impact (+5.4%) on purchasers' earnings.

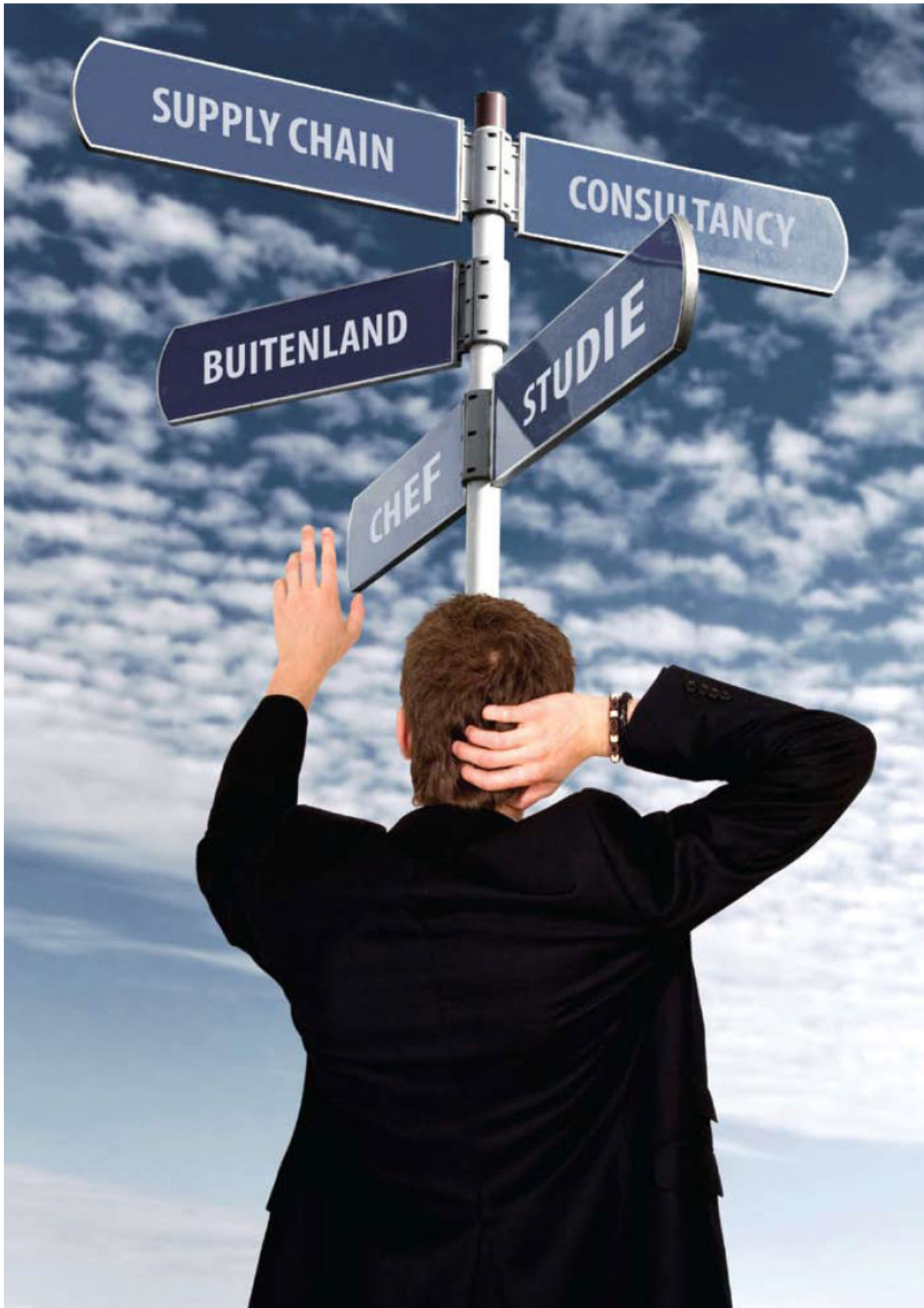


Illustration: Carrier special enclosed by the Dutch specialist journals Deal! and InLogistiek, June 2007, p. 11

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1. Introduction

Salaries earned in the Dutch purchasing profession have increased a lot over the last decade. The most obvious reason for that change is the upgrading of purchasing positions. The strategic purpose of the purchasing profession has got more and more attention within organizations (Van der Heijden & In 't Veen, 2005) . Due to this development purchasers in organizations have become more crucial. This in combination with narrowness on the labour market for purchasers has led to big differences in what an organization can or is willing to pay for a purchaser.

When an organization wants to contract a purchaser, a negotiation will start in which both parties will try to find a satisfying optimum. An agreement on the negotiated outcomes will be put in a job contract. The contract itself reflects in general the mutual consensus about working conditions, responsibilities, career possibilities, wages and many other aspects. In that sense, signing a job contract will signal complete satisfaction about the job and the job negotiations. Otherwise, the purchaser had to re-negotiate about the unsatisfactory conditions or would not have signed the contract anyway.

The conditions and context, in which a job contract is signed, are very important in contract negotiations and contract renewals. Difficulties in determining the financial terms can be the split-off point in these negotiations. To reduce possible unwanted job mobility in contract renewal situations, it will be interesting to know whether a higher salary will offset purchasers' intentions to leave an organization. In this situation, both the employer and employee face the same problem. What is a well suited financial package for this particular job?

In order to bring supply and demand of purchasers together and/or to offer attractable financial packages to keep contracted purchasers satisfied, it will be useful to have an objective measured salary survey of the Dutch purchasing profession. Especially in case there is a shortage of well educated and skilled purchasers, it would be a pity for both parties if salary negotiations fail, due to wrong assumptions about market values.

1.1 Research question

With this knowledge in mind, it will be interesting to research how a purchaser's salary is established, of which components it consists and how this is related to career and education choices made in the past. The research question for this report is therefore the following:

How are purchasers' primary and secondary salaries influenced by career and education choices made in the past?

To provide answers to this main hypothesis, the following two sub questions are formulated:

Q1 Which determinants influence purchasers' primary and secondary salary?

Q2 How can we predict purchasers' salaries given these determinants?

1.2 Societal and scientific motivation

In the Netherlands some surveys have been done on the remuneration of purchasing professionals (like Berenschot surveys). Although this is the case, an academic survey on this matter has never been taken place. This survey tends to build on academic experience from abroad, in order to develop a salary model in which the base salary of purchasing professionals could be predicted. This practical remuneration tool will be useful for purchasers and all people who are involved in determining purchasers' salaries. This predictive salary model is posted on www.salarisinkoop.nl.

1.3 Methodology

In order to gain insight in and to have an overview of the purchasing profession, five interviews with recruiters at InQuest⁷ have been conducted. They provided useful information about trends and developments in their work. Additionally, 5 interviews have been conducted with purchasers (on senior and strategic level). These interviews gave more insight in how salary determination processes occurs. Along with this knowledge, a literature review has been conducted in order to find explanations for salary differences. Also other salary surveys outside the Netherlands have been examined, in order to find the most important variables, which would have the most impact on the height of a purchaser's salary. This information was used to create a questionnaire in order to gather data from procurement professionals.

⁷ InQuest is market leader in providing recruitment, interim management and executive search services in procurement in the Netherlands.

1.4 Research set-up and response

The questionnaire (61 questions, mostly closed questions) has been made electronically and posted on the website of the Erasmus University Rotterdam. An invitation to participate in this survey has been sent to 11,857 purchasers. The purchasers' contact information (including email address) was extracted from the databases of InQuest, NEVI and Berenschot Procurement⁸. However 1,127 email addresses could not be reached, so 10,730 could be labelled potential participant⁹. From 2,482 purchasers we received back the filled in questionnaire. From those, 260 didn't spend more than 50% of their time on purchasing activities and therefore were not used. The survey was conducted solely amongst full-time procurement professionals employed on a permanent contract in the Netherlands (so no independent contractors, consultants or interim managers have participated). In the invitation letter was stated which research group was targeted. Unfortunately some purchasers did not read this letter very carefully and filled in the questionnaire anyway. These filled in questionnaires were ignored as much as traceable. This resulted in an overall net participation grade of 20.3% (2171 out of 10679).

1.5 Limitations and built in restrictions

Procurement professional's satisfaction about his or hers current received base salary and financial package has not been measured. Also the loyalty of purchasers to their organization has not been measured. Due to our dual research goal, investigation of financial packages received by purchasers on the one hand and obtaining an impression of the 'maturity' of procurement departments on the other hand (aligned with that the position of purchasing personnel within organizations), it was not possible to make the questionnaire any longer. The questionnaire with 61 questions was already quite long.

For this research accurate measurable data has been used. Misunderstandings and other misinterpretations about the data could have occurred. The setup of the questionnaire was to formulate the questions as objective as possible. This can be regarded as a limitation, because no questions about personal intentions, reasons and motivations were included in the questionnaire. This is also reflected in the predictive salary model. Only facts about one's gender, age, education and actual spent responsibilities were used.

⁸ Berenschot is a well known Dutch management consultancy firm.

⁹ We had 101 unsubscribers, 390 hard bounces, 619 out of office replies, 9 mail boxes were full and 8 soft bounces.

1.6 Definitions

Speaking in terminology terms, there are several ways to label purchasers working for organizations. The term purchasing profession is somewhat misleading. The term ‘to purchase’ is often used in situations which actually describe the core business of purchasing activities, like contract negotiations, ordering of goods and administrative handling of these orders. The term ‘procurement’ has a somewhat wider scope. This refers not only to all purchasing activities described above, but also to the cooperation with other departments within the organization, the strategic aspects of the selection of suppliers and the usefulness to have a strong and long term relationship with (non) strategic suppliers. The term ‘procurement’ approaches more the terminology of Supply (Chain) Management. In this report the term ‘purchasing’ will be used for all procurement, materials management, and supply and supply chain management related activities. And a ‘purchaser’ will be regarded as a professional working in purchasing or procurement.

1.7 Structure

In chapter 2 an outline will be given of the current trends and developments within (and around) the purchasing profession. Chapter 3 will be a theoretical chapter in which all important salary determinants will be outlined, which could have an influence on one’s base salary and financial package. This will be done on three different levels, a personal level, a functional level and an organizational level. Also nine hypotheses will be formulated. The methodology and response on the posted survey will be analysed and presented in chapter 4. In chapter 5, we will zoom in on all the results and test our hypotheses formulated in chapter 3 with our survey results. The main conclusion is found in chapter 6.

2. The purchasing profession on the move

As pointed out in the general introduction, the strategic usefulness of a purchasing strategy is becoming more and more relevant. The developments and trends underlying this professionalizing process of the purchasing profession in general, will be shortly described in paragraph 2.1. The actual stand of the professionalization processes differs per organization. Differences among branches and sectors can be denoted. This will be described in paragraph 2.2. Purchasers who are working in organizations with a professional purchasing department, are mostly highly educated, eager and driven to bring purchasing to higher levels. In these organizations, job requirements are often much higher, which consequently will have influence on the salaries denoted in such organizations. This will be discussed in paragraph 2.3. Along with that new internal organization structures are formed and often more inter-department cooperation occurs. The consequences of these changing job activities and the competences and skills needed for good performing in these environments will be revealed in paragraph 2.4. Finally, in paragraph 2.5, some conclusions will be presented.

2.1 Development & Trends

Until a decade ago, the purchasing profession was not quite developed in many organizations. In those days, the Dutch purchasing profession often had a less attractive imago, compared to other professions (such as the sales profession). Purchasers were regarded low-ranked people and also low-paid people, compared to, for instance, sales persons. Although this is somewhat exaggerated, it covers mostly the general view on 'old' purchasing jobs. In line with that, not the most talented people were working in the purchasing profession. Due to this undergraduate of purchasing in general and the quality of the people working in purchasing, more focus has been attended internationally to the functioning and overall level of purchasing departments and purchasers in particular.

Many purchasers are transforming their department from facilitating services to an organization towards taking the lead in structuring an organization to a Total Cost of Ownership (TCO)¹⁰-minimizing and knowledge sharing organization. Currently, many work

¹⁰ TCO, also named Total Cost of Operation, is a financial estimate designed to help consumers and enterprise managers assess direct and indirect costs related to the purchase of any capital investment. A TCO assessment ideally offers a final statement reflecting not only the cost of purchase but all aspects in the further use and maintenance of the equipment, device, or system considered. This includes the costs of training support personnel and the users of the system, costs associated with failure or outage (planned and unplanned),

environments of purchasing departments are changing. Organizations are becoming more and more aware of the fact that professional purchasers do add a lot of value to their organization. It is well known that in many organizations not all procurement related transactions actually are handled and supervised by purchasers. Therefore, it would be much easier for purchasers, if they would be fully accountable (e.g. by signing all procurement related bills) for all related procurement costs. More volume means more power to negotiate lower prices. This has led to more awareness of the strategic importance of purchasing as a whole as compared to a decade ago. Mulder *et al.* (2005) has discovered ten trends in the purchasing profession. From these ten trends (see Table 1) some will be highlighted.

Trend	Average	Sd	N
Purchasing strategically more important	2.67	0.53	237
Selling internally	2.55	0.63	237
E-business	2.44	0.62	238
Focus on core competencies	2.38	0.66	237
Working in multidisciplinary teams	2.32	0.72	237
Chain management	2.31	0.72	236
Globalisation	2.19	0.74	236
Alliances	2.19	0.71	237
Differentiation	2.17	0.66	236
Ethics	2.05	0.70	237

Table 1; Measurement of influence of purchasing trends on the daily operations of purchasers on a 1-3 point scale; 1 unimportant, 2 neither important nor unimportant, 3 important; Mulder *et al.* (2005, p. 191)

Globalisation has led to more price competition. In order to deal with globalisation, more attention is paid to Supply Chain Management (Oliver *et al.*, 1982; Lambert *et al.*, 2000). Supply Chain Management can be denoted as ‘a set of approaches utilised to efficiently integrate suppliers, manufacturers, warehouses, and stores, so that merchandise is produced and distributed at the right quantities, to the right location, and at the right time, in order to minimise system-wide cost while satisfying service level requirements’ (Simchi-Levi *et al.*, 2000, p.1). Supply Chain Management (SCM) is different from Supply Management. SCM emphasizes all aspects of delivering products to customers, whereas Supply Management emphasizes only the buyer-supplier relationship. SCM represents a philosophy of doing business that stresses processes and integration. Supply Management seems to be the term

diminished performance incidents (i.e. if users are kept waiting), costs of security breaches (in loss of reputation and recovery costs), costs of disaster preparedness and recovery, floor space, electricity, development expenses, testing infrastructure and expenses, quality assurance, incremental growth, decommissioning, and more. (Wikipedia, 19th January 2007)

that now is more commonly used to refer to the systems approach when it comes to the purchasing function (Flynn *et al.*, 2001, p. 11). Supply Management focuses more on the inflow of products and services rather than the processes and integration related to these inflows.

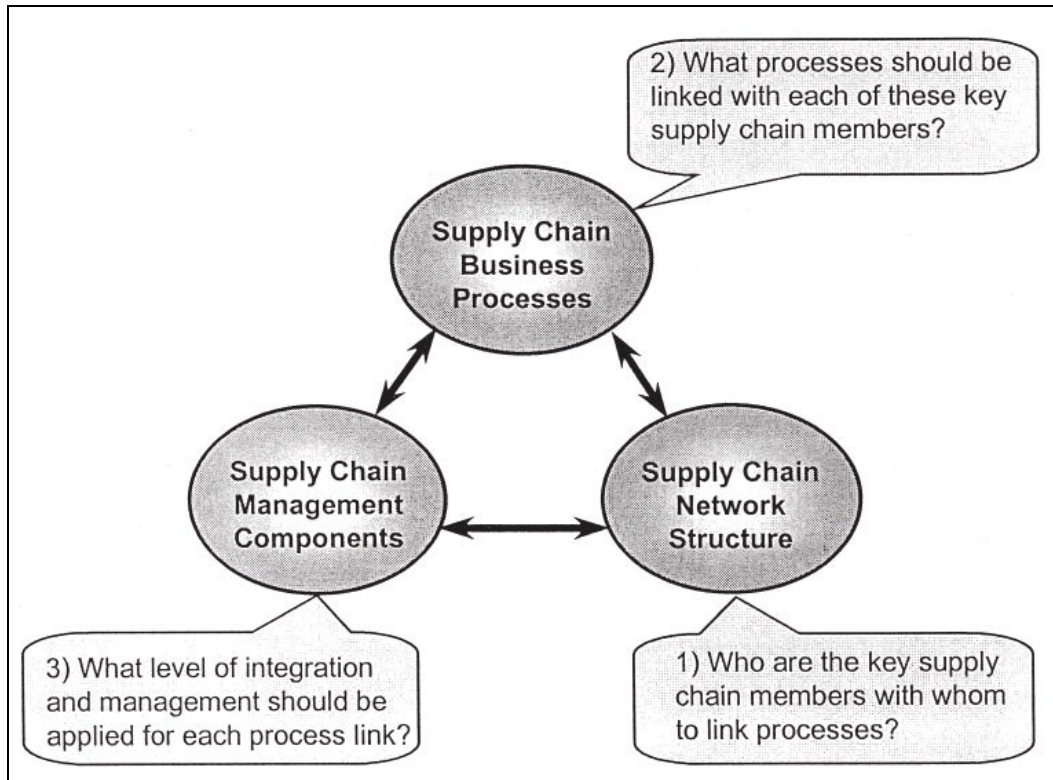


Figure 1; Supply Chain Management Framework, elements and key decisions; Cooper *et al.* (1997, p. 70)

SCM (see Figure 1) has influenced the daily operations of purchasers significantly. This has resulted in tighter relationships with suppliers, earlier involvement of the purchasing department in company projects, more awareness of the suppliers and customers market and more recognition for the attribution of purchasing departments (and purchasers in particular) to organizations. Sharing knowledge and creating transparency throughout a company also leads to more awareness of everyone’s important contribution in generating profit. This internally awareness is very important, because this leads to more cooperation.

Nowadays, there’s more emphasis on building long-term steady buyer-supplier relationships. These valuable Supply (Chain) relationships are built upon a unique combination of Service Level Agreements (SLA’s), such as agreed prices, qualities and delivery times of the products and/or services. Organizations try to maximize their profit, but it will not always be possible

to get the lowest prices for the demanded products or services. The total cost of losing a strategic supplier are often much higher than getting discount for one or more transactions.

Alfred Dupont Chandler's (1962) famous saying, 'structure follows strategy', denotes exactly what's occurring in the Dutch purchasing profession. The strategic part of purchasers' jobs gets even more attention. With this attention, the internal link in the organization between the operating purchasers and the CEO-level is shortened. More and more purchasing functions are created on higher levels (such as board of director's level) in organizations in the Netherlands. Even the Dutch government has installed a CPO (S. Eilander, installed on November 15th 2006). This leads overall to higher job responsibilities for purchasers. Professional purchasers nowadays are challenged (and also instructed by organizations) to (re)organize their purchasing processes and departments. The purchasing function is moving from a repetitive buying activity towards selecting strategically suppliers, negotiating company wide window contracts, reducing the number of suppliers and many other activities.

An aligned development is a more strategically focus on the core products and/or services of organizations. Organizations can form strategic alliances with suppliers of these core products and/or services. By doing this, they can increase competitive advantage. Gelderman and Van Weele (2003) mentioned several supplier strategies: balance, exploit and diversify. By using the diversify supplier strategy, organizations choose to diversify themselves from competitors in order to create competitive advantage. In line with this, it will be unlikely that those organizations have the same strategic suppliers as their direct competitors, unless this is unavoidable. Increased mutual dependency with strategic suppliers can make organizations more vulnerable. This depends on the size of the organization and how strategically important the products and/or services are for the organization off course.

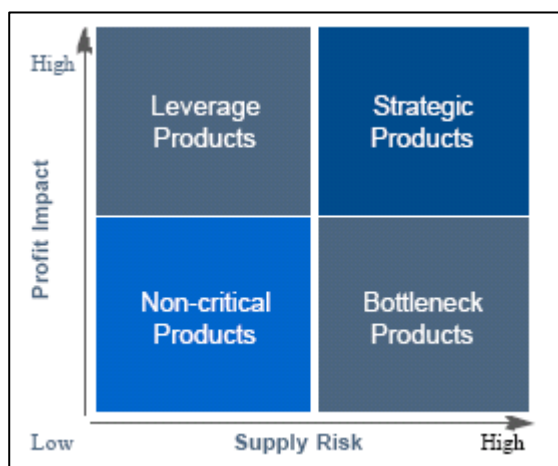


Figure 2; Purchasing portfolio matrix; Kraljic (1983, p. 111)

This can be seen clearly in Kraljic's (1983) purchasing portfolio matrix (see Figure 2). Especially, when the relationships in the

strategic alliances become very tight, one of the partners could try to reduce supply risk by searching for alternatives, buy one or more suppliers and so on. Then these suppliers move out of the strategic box into the leverage box. Cooperative purchasing between organizations is most likely and lucrative when purchasing transactions are routine (low supply risk, low profit impact) and brought by the same supplier for the same products and/or services. The frequency of these transactions is often very high, resulting in potential to reduce cost for these products and/or services. Higher volumes could lead to discounts, which could be shared between organizations in case they centralize their purchasing activities.

2.2 Branch differences

In the Dutch purchasing profession the professionalization of purchasing processes varies over branches, sectors and organizations. For those organisations, in which low purchasing cost are essential for survival, a purchasing strategy can be very useful or is even necessary. In such organisations this process of developing, implementing and sustaining of an overall purchasing strategy has often already been completed (in an effective and efficient manner or not at all). Other organisations started later with this process. This depends on the purchasing life cycle phase of the branch. Trading companies for example are highly aware of how total purchasing cost affects their profit. Traders know exactly when they have bought their products and/or services at the right price and/or at the right moment. By closing a deal, they know if they made a profit or not.

The contribution of the purchasing department to the organization as a whole and the profit in particular can be very large. In line with Van Weele (2005), a trend can be denoted from cost reduction to risk reduction towards value creation (see Figure 3). The knowledge acquired and adopted by purchasers can be useful for innovating the products and/or services of organizations. Purchasers can be informed early by suppliers about new technologies, trends and so on. Besides their function as internal information source, purchaser's results also have a big impact on the performance of the organization as a whole. In organizations where the share of the total purchasing cost is very high as compared to the total turnover (also denoted as the purchasing quote), the economic value added by purchasers will be very large (Ruiter, 2004). A reduction in the purchasing cost will lead to a much higher increase in total profit (DuPont analysis¹¹).

¹¹ DuPont analysis: A 1% reduction in purchasing costs will lead to a more than 1% growth in profit, due to a multiplier effect.

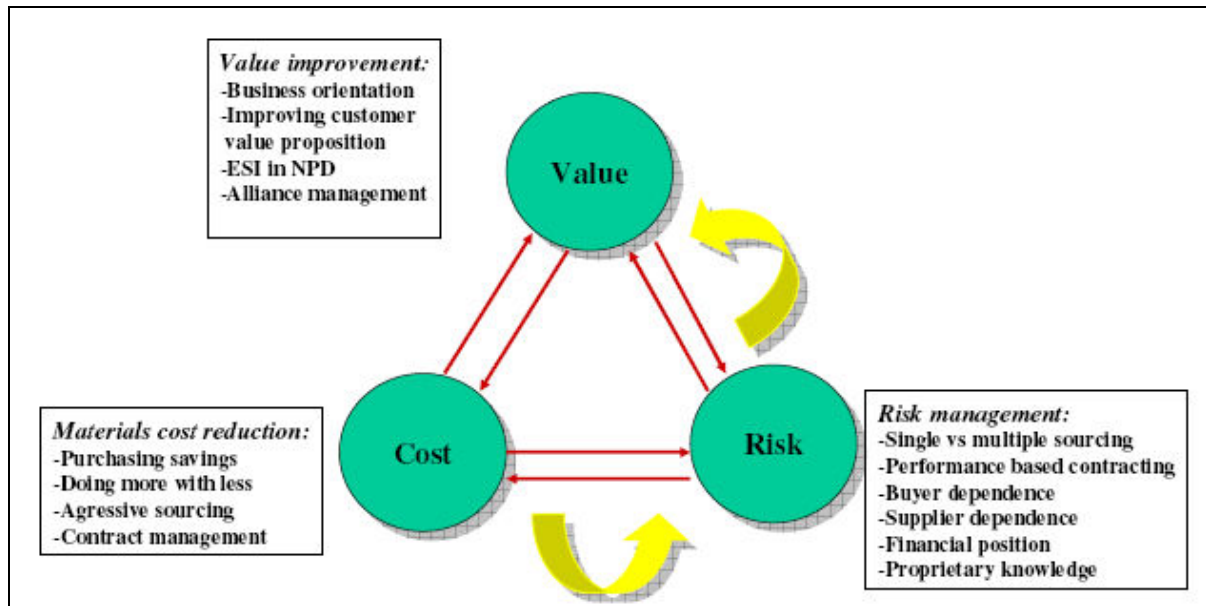


Figure 3; Traditional agenda of procurement is gradually changing...; Van Weele (2005, p. 198)

The purchaser's influence on the trading-results is many times larger, if we compare this to sellers (Van der Heijden, In 't Veen, 2005). Therefore Business-to-Business firms with a high purchasing quote often pay higher salaries. Also because the cause and effect of a reduction in purchasing cost are more visible in a firm's financial results, this lead to an acknowledged contribution to companies cost management and (through that) profit realization. This cause and effect will therefore be highly rewarded.

2.3 Purchasing job requirements

Products and services that do not belong to the core products and services any more could be sold or outsourced. This results in more decisions about whether products or services will be outsourced. Purchasers can provide very useful information to management for making these decisions. It depends on how the company is structured, whether they have the authority to make these decisions themselves. To acquire this decision power, purchasers often either need to gain this authority or claim it. They need to convince other organization members of their capabilities in making these decisions. Then the purchasing department will become a more crucial spin in the web. Unfortunately, there are also many purchasers who can not handle these changing work circumstances. They will not, can not or do not know how to confront their own organization with its current procurement problems.

Purchasers have to negotiate hard in order to get the best deals. Related to this and even more important is building excellent long-lasting relationships with their suppliers. Purchasers have to embed these established supply relationships in the organization. This can be done by showing the importance of these particular suppliers for the organization as a whole. Besides, purchasers also have to know and understand the customer market, in order to buy the most profitable and sellable products. In the labour market for purchasers it is clear that the requirements for purchasers increase considerably. Nowadays, purchasers have to be proactive, responsible, convincing, and communicatively very strong. Also, they need to understand the purchasing processes deeply. In short, purchasers have to act more like an entrepreneur. They need to make themselves indispensable, so that organizations can not bypass them.

But that is quite difficult for purchasers, who want to stick to their routinely work processes. This can either result in proactive purchasers or purchasers who want to stick to the rules. This big gap between ‘old’ and ‘new’ purchasers will be reflected in differences in job functions, descriptions and enhanced with that remuneration.

2.4 Purchasing departments in organizations

As denoted before, the acknowledgment of the strategic importance of the purchasing department is increasing. In particular big commercial firms act on this knowledge by creating new procurement functions on director’s level. One new function that is widely used is ‘Chief Procurement Officer (CPO)’. With this position at board of director’s level, it is possible for purchasing departments to show the directors how important a cost saving purchasing strategy will be for the organization. In some organizations procurement teams are formed, consisting of people from several departments, like Finance, Human Resources and Purchasing. In these procurement teams, decisions are made co-dependently. In smaller organizations, hierarchies are flatter, whereby the purchasing department is more likely to be a staff department. Sometimes the purchasing department is part of the finance department. The influence of the purchasing department then will be much less.

The job requirements for purchasers have steadily increased over the years. Organizations operate in complex circumstances, so flexibility is demanded from all employees. This also accounts for purchasers. Organizations will try to minimize the number of suppliers, and relationship management will become more important. According to Handfield and Nichols

(1999) relationship management affects ‘all areas of the Supply Chain’, and it has ‘a dramatic impact on performance’ (Handfield and Nichols, 1999, p. 67). It is also the most difficult part of the Supply Chain Management practices. Purchasers will therefore need particular skills, which can also be found by sellers and entrepreneurs.

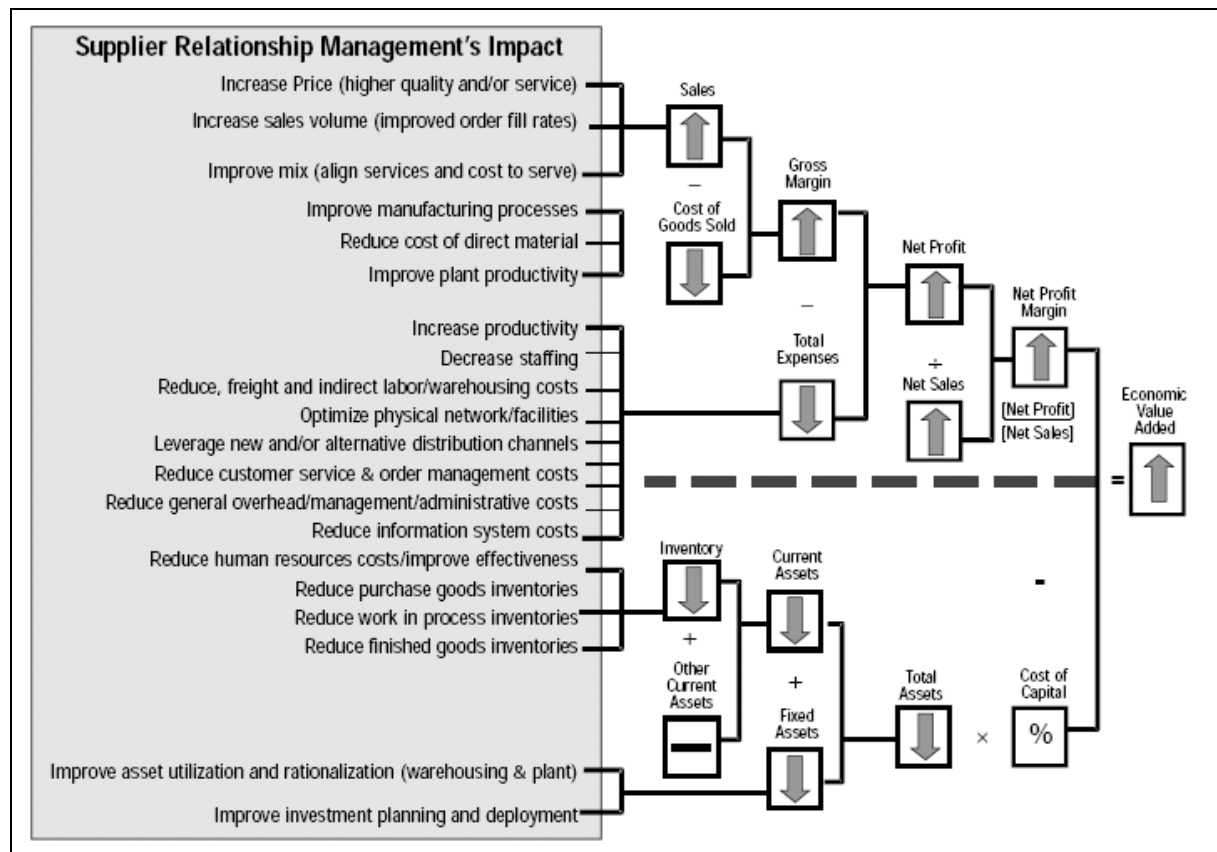


Figure 4; How supplier relationship management affects economic value added (EVA); Lambert *et al.* (2001, p.11)

Purchasers need to work more efficiently, need to expand and exploit relationships with suppliers (see Figure 4) and need to think strategically in order to be competitive in the future. Depending on a firm’s strategy and purchasing strategy, purchasers need to develop and arrange the purchasing department so that it can support the general strategy and the purchasing strategy in particular efficiently and smoothly. This process has to be done continuously. Decisions about (de)centralizing of purchasing activities and decisions about in- and outsourcing of products and/or services will be made repeatedly.

In firms that do not acknowledge the strategic importance of the purchasing department, purchasers will have a quite difficult job when they want to build a professional purchasing

department. They will have to oppose to the somewhat negative view on their department, which will be present at other departments. These other departments may have been the departments which made the decisions about what has to be ordered. They will not be pleased with resistance from the purchasing department. To change attitudes, motivations and structures, purchasers will need special abilities. In short, they must be able to act managerial (e.g. as a change manager). Competences for handling and transforming political and social processes will be necessary. On the other hand purchasing department can not always claim more decision power or more recognition. Sometimes organizations make such specialized products (e.g. oil platforms) or provide such special services (e.g. hospitals) or are structured in such ways (e.g. health-care) that purchasers always will be more ennobled ordering and administrative people.

2.5 Conclusion

The Dutch purchasing profession is on the move. Globalization has stirred Dutch organizations to pay more attention to their suppliers. Many organizations have formulated a purchasing strategy or are currently working on it. To make these strategies operational, organizations have (re)organized their organization around less, but more strategically suppliers. The process of selecting these suppliers and deepening the relationships with them, have put pressure on purchasers to learn new abilities and skills. The price paid for products and/or services will still be very important in these relationships. The integration of supplier contacts within the organization and/or the integration of the Supply Chain as a whole (vertical integration), is a process that continues up till now. Knowledge sharing and stirring innovation will be more and more crucial for the whole Supply Chain.

Although the professionalization of the purchasing departments varies very much between organizations, nationwide there is a tendency towards more professional purchasing departments. The awareness of purchasers' contribution to profit realization throughout organizations has led to the creation of purchasers' jobs at higher levels. Also purchasers are paid better, as compared to other functions, over the last few years.

3. Salary determinants

A lot of scientific researches on salary and wage determinants have been conducted in the past. Although this is the case, not many researches have been conducted specifically for the purchasing profession. The research definition of the dependent variable, in this case the base salary (also referred to as salary), will be described in paragraph 3.1. To be able to test our main hypothesis and to develop a predictive salary model, we will first dig into the specific personal, job and organizational characteristics which could have an influence on a purchaser's earned salary. This will be presented and discussed in the following paragraphs 3.2 till 3.4. In every paragraph one or more hypotheses will be formulated, which will be tested later on in chapter 5. We will end this chapter with a conclusion in paragraph 3.5.

3.1 Research definition base salary

Base salary comparisons will be conducted with the following considerations in mind: they are based on brute amounts (include also 13th and 14th months), they are recalculated to 38 hours working weeks and will include holiday allowances but exclude expense allowances. Recalculation to 38 hours working weeks is based on the average hour's working weeks of the respondents. Organizational and personal bonuses and having a lease car will be regarded as secondary salary benefits.

3.2 Personal characteristics

Age and work experience

In the Netherlands salaries for (young) people are protected by law. The Dutch act Minimum Wage protects young people up to the age of 23 against employers who want to exploit them. People older than 23 year are also protected by the same act. They will then be regarded as someone with the age of 23 (minimum wage for an adult). Therefore it is not surprising that age for these young people will have a positive impact on wage and wage growth. The lawfully minimum wages in the Netherlands are also subjected to wage growth, due to inflation compensation, but these are often relatively small. Early research done by Edward Lazear (1976) has found a strong relationship between age and wage growth for young people. After individuals had reached the age of 25.2 years, work experience exceeded aging as the most important determinant in explaining wage growth. Another interesting finding was

that wage growth was inversely related to previous work experience. This indicates that wage growth rates will be smaller when there is more work experience.

Gender and family circumstances

Changes in patterns of long-term employment have made understanding the determinants of different career forms more and more important for careers research. At the same time, the rise of dual-earner families, have demanded greater attention to the way in which gender and family characteristics have shaped purchasers' careers (Valcour and Tolbert, 2003).

During the last decades a shift in the gender composition of the workforce has taken place, whereby the women's rates of labour-force participation have increased steadily and women more than ever occupy male career paths (Blau *et al.*, 2002) and former exclusive typified male jobs. As a result of women's increased labour-force participation, family structures have changed. In dual-earner families, problems of balancing work and family demands are apt to become an important influence on men's as well as women's careers (Moen, 2001). Despite a decrease in the Netherlands and many other countries in the percentage of married couples, people's marital status can have a positive effect on one's earnings. Being married has shown to have a positive effect on men's earnings, but not on women's earnings (Hill, 1979; Korenman and Neumark, 1991; Pfeffer and Ross, 1982). According to Valcour and Tolbert (2003), this could reflect the fact that the traditional, gendered division of labour in the family relieves men from most domestic responsibilities. Women instead, usually do more domestic chores (Hoghschild, 1989; Pleck, 1985).

In traditional research, many researchers have found significant lower earnings for women as compared to men (Hartog, 1983). Also in the Netherlands huge differences between men and women salaries have been found (Steenkamp *et al.* 2001; Elsevier, 2002), which indicates that women earn less than men (Webbink, 1999). Although this relation has been found, no adequate answer could be given to the question, whether men are better salary negotiators or not (Stuhlmacher *et al.*, 1999). But according to their own research men do negotiate more favourable settlements for themselves than women.

H1: Male purchasing professionals earn more base salary as compared to female purchasing professionals.

H2: Male purchasing professionals' secondary conditions of employment are better and higher as compared to female purchasing professionals' secondary conditions of employment.

Education and personal development

A men's and women's personal development is a very complex process. Many situations, circumstances, personal considerations and choices shape one person's life. Parental education and influence play a huge role as well (Middleton and Loughead, 1993). When people are grown up, they are responsible for their own acts and decisions. Some choices have a direct impact on one's earned salary. For example, studying abroad has a significant impact on the height of the received salary (Meng and Ramaekers, 2000).

H3: Working abroad has a positive impact on purchasing professional's denoted base salary.

The most obvious and widely used way to measure educational experience in relation to received salary, is by measuring the total number of years education received and the level of education in relation to the received salary. In the Netherlands outcomes of a certification exam have large effects on the earnings of school-leavers (Hartog, 1983). Also the number of educational years has a positive influence on earnings. Although in Netherlands this is generally accepted, also indirect side effects can be denoted. Human Capital Theory (Becker, 1964) focuses on these indirect salary side effects. Weiss states that better-educated workers tend to have 'lower propensities to quit and to be absent, are less likely to smoke, drink, use illicit drugs and are generally healthier' (Weiss, 1995, p.133).

H4: Purchase professionals who have finished specific procurement related education at institutions (like NEVI and APICS) get higher base salaries as compared to purchase professionals who didn't finish such educations.

Job satisfaction and job mobility

From a psychological perspective, it will be understandable, that job satisfaction can be highly related to intra- and inter-organizational mobility. Purchasers' job satisfaction and related to that one's own success perception, will be subjective and independent of observable indicators, such as salary, hierarchical attainment or spent responsibility. Job satisfaction will depend on the purchasers' work responsibility, recognition gained from other organizational members and the possibilities to develop one's self. It will also depend on the career path one

already has achieved and one's future dreams. This aspect of career success is typically assessed with measures of satisfaction with global career success or facets of career achievement including satisfaction with pay, promotions and the development of skills (Greenhaus *et al.*, 1990; Turban and Dougherty, 1994).

Researchers have found a positive relationship between earnings and organizational tenure (Brett and Stroh, 1997; Marcotte, 1998; Scandura, 1992), although longer organizational tenure predicts lower rates of salary progression between two time periods (Wayne *et al.*, 1999). Switching from employer can have a positive effect on denoted earnings. In salary negotiations, one's actual received primarily and secondarily salary is often the starting or reference point. In that sense switching can have an upward pressure on earnings. It is interesting to discover that intra-organizational mobility in general has a greater impact on men's earnings compared to women's earnings (Kirchmeyer, 1998; Lyness and Thompson, 2000; Stroh *et al.*, 1996) and that men's salary progression is much higher than women's salary progression (Stroh *et al.*, 1992).

Inter-organizational mobility on managerial level will also lead more often to higher earnings for men as compared to women (Dreher and Cox, 2000; Brett and Stroh, 1997). An explanation for this could be that men have better access to social networks that supply information instrumental to career development and job opportunities in other organizations (Valcour and Tolbert, 2003; Ibarra, 1992, 1993). Rather contrasting and surprising is a research done by Lyness and Thompson (2000), where they found that a history of inter-organizational mobility was negatively related to income.

H5: Intra-organizational mobility has a more positive impact on men's base salaries than on women's base salaries.

3.3 Job characteristics

Type of employment

There is little evidence that male and female purchasers act very differently in their jobs. Male and female purchasers become socialized into their roles or will be selected by organizations according to the same set of organizationally relevant criteria (Eagly *et al.*, 2003). Male and female purchasers will occupy the same organizational roles, whereby they should exhibit

very little differences (Park and Krishnan, 2005). Also their perceptions of sellers' behaviour are more or less the same. In an overview article by Ellen Bolman Pullins *et al.* (2004), about gender issues in buyer-seller relationships, mostly no differences were to be found between male and female purchasers on the trustworthiness (Plank, Reid and Pullins, 1999), the quality of the relationships (Crosby, Evans and Cowles, 1990) and the customer orientation (Brown, Widing and Coulter, 1991) of a salesperson.

Most purchasers will be organizationally employed, with the intention to work either for a short time or for many years. Rather specific purchasing roles, like interim-managers and purchasing consultants, will be more self-employed or small business owners. Interim-managers and consultants are more entrepreneurial oriented, due to their temporarily work for organizations. Their need for achievement, autonomy and self-fulfilment, which are prominent motivating factors in starting a business (Cooper and Dunkelberg, 1986; Cromie, 1987; Moore and Buttner, 1997), will lead to more self-employment or business ownership. Also, the working conditions and expectations of interim-managers and consultants will have an upward pressure on their denoted earnings.

Job responsibility, promotion and risk

Aligned with every job function, there's some level of job expectations, which need to be fulfilled. This kind of job responsibility will be reflected in one's salary. There are several ways to denote this, for example in one's annual evaluation conversation with his or her supervisor. In the purchasing profession, one way to measure job responsibility is by quoting one's spent responsibility or purchasing authority. The spent responsibility is the total amount of money spent on purchasing in one year for which he or she is solely responsible. Purchasing authority refers to the maximum amount for which a purchaser is obliged to sign contracts.

One of the first researches done on job responsibility, pay and promotion was done by Michael Manove (1997). It appears that termination contracts in combination with having job ladders in organizations will have a stimulating effect on workers. As he explains: 'a high wage in a job high on the promotion ladder not only elicits more effort from the incumbent in that position, but also stimulates workers in jobs lower down, provided only that they have a positive probability of promotion to the high-paying position (Michael Manove, 1997, p. 88)'. More surprising was the result that even when jobs and responsibilities are identical, it is

profit maximizing to create a job ladder and offer different wages to different workers. Job ladders will then primarily be used for incentive reasons.

3.4 Organization characteristics

Firm size and location

Virtually every study covering a broad spectrum of time periods and OECD countries has found a positive relationship between firm size and wages (Brown et al., 1990; Oosterbeek and Van Praag, 1995). However, many of these researches were static, cross-section studies taken at a single point in time. The research of Geroski (1995), which captured more time-periods, revealed a systematic negative relationship between firm age and growth, and firm size and growth. New firms either disappear or grow. As new firms get older, wages and productivity increase as well (Baily, Bartelsman and Haltiwanger, 1996).

Several researchers also calculated a selection bias effect (Idson and Feaster, 1990; Oosterbeek and Van Praag, 1995). According to Garen (1985), monitor cost will rise with firm-size, resulting in selecting people in small organizations on IQ basis and in large organizations on schooling. Large organizations seem to be quite successful in using schooling as a screening device. And these organizations indirectly, due to positive correlation between schooling and IQ (Oosterbeek, 1990), could attract workers with high levels of IQ.

When it comes to the selection process of qualified purchasers, it will be obvious that in high populated areas more qualified personnel can be found. On the other hand, organizations in high populated areas, like ‘De Randstad’ in the Netherlands will pay higher salaries as compared to less populated areas, due to agglomeration effects¹².

H6: Organizations located in densely populated areas pay higher salaries as compared to organizations located in less populated areas.

¹² Agglomeration effects have a positive impact on the average productivity and wages in dense regions (Ciccone, 2002).

Firm profitability and branch influence

In academic literature a major regularity can be found about the existence of large and persistent inter-industry wage differentials for workers of equal quality in equivalent occupations (Katz and Summers, 1989). This phenomenon can be found internationally (Kahn, 1998). These differences become clear when we compare branches to each other. It is commonly known that (semi-) governmental organization pay less compared to organizations in industry, trade or financial services. Although it is very hard to compare specific purchasing jobs to each other, it will also be expected that profitable organizations will assign higher personal bonuses as compared to none or less profitable organizations. Especially in (semi-) governmental organization profit can not be made, so they should have a disadvantage as compared to other branches.

Importance of purchasing department

As stated in chapter 2, managing purchasing cost and suppliers' relation is becoming more and more important. Organizations differ a lot in managing purchasing costs. Purchasing cost can be relatively high as compared to other operating cost. Therefore, purchasers have a huge impact on profit (result at the bottom line). When the profit of an organization as a whole is very strongly linked to the performance of the purchasing department, it is very likely that these purchasers are valued likewise. To measure the importance of purchasing activities to the organization, often the purchasing ratio¹³ is used. Another measurement of the importance of purchasing in general will be its representation at management or even board of director's level.

3.5 Conclusion

From a theoretical point of view, many variables could explain salary differences among purchasers. Choices made in the past often influence today's earned salary. Education is a good example. In most functions a purchaser will earn more in the same function if he or she would have a higher finished education level. But this will occur maybe only in the first years of working experience, although large organizations (like multinationals) use schooling mostly as a screening device for (management) potential. Education choices made in the past are one's first milestone in setting the characteristics right for well paved career opportunities.

¹³ This is measured by dividing the total purchasing costs on the total sales times hundred.

When a purchaser has started in an organization, normally he or she will get a higher salary every year (because of inflation correction and/or promotion). But one's career depends on one's ambition to learn, the ability to deal with mistakes, how to take responsibility, in understanding procurement processes and so on. The choices for particular jobs, jobs within particular organizations influence very much one's earned salary. Although salary doesn't represent one's success, it is a reflection of one's abilities and capabilities. This will also be reflected in the activities a purchaser will or has undertaken (in the past), such as working in a foreign country, getting additional procurement related trainings and seminars and so on. One's actual purchasing position within an organization has been influenced by dedication and well considered career and education choices.

4. Survey response

In this chapter we will outline the response of the ‘Career en Salary monitor Procurement 2007’ survey. We want to find out whether these results are representative. Paragraph 4.1 will dig into the measurement issues and will reveal certain problems which occurred during the questionnaire outset. The representativeness of the survey on results will be presented in paragraph 4.2, along with the summary statistics. The summary statistics will be presented for the variables sector, gender, age, education level and function level within the organization. Many others could be used to test our sample with the whole population. But due to little knowledge about the whole population, these were the best variables to compare. A short conclusion will be presented in chapter 4.3.

4.1 Measurement

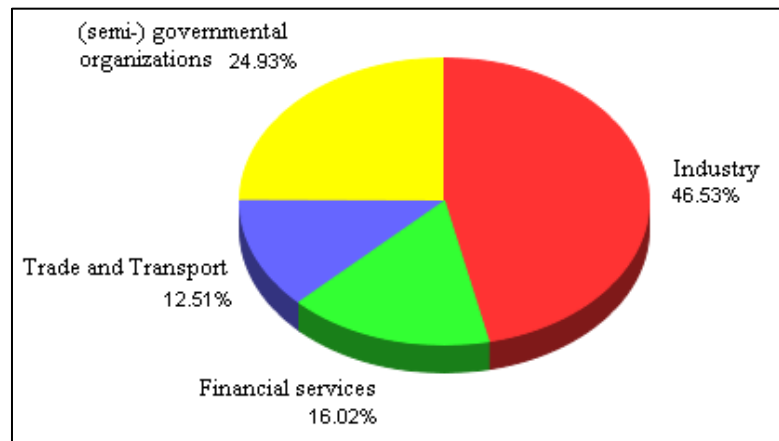
The aim of this survey was to discover which specific variables influence and/or affect a purchaser’s salary. This was done by way of a wide range of questions, divided in more or less three different aspects: personal characteristics, job characteristics and organizational characteristics. The focus of the questionnaire was more on the personal and organizational characteristics rather than on personal competences or competences required for a specific purchasing job. Although every job is different in the sense of job setting, we had to find a way to compare jobs to one another. We tried to do this, by using Berenschot’s Universal System Berenschot (USB). USB makes it possible to compare job functions, by using several criteria and variables. In this system 13 job function categories in the purchasing profession can be denoted. By giving a lot of information about every job function category in advance, several questions about job characteristics could therefore be left out in the questionnaire.

4.2 Representativeness of response

In order to be able to test our hypotheses, we need to have a representative sample of the complete population of purchasers in the Netherlands. The NEVI, the Dutch organization for promoting the purchasing profession and one of the participants, could not give an adequate answer. They estimate the whole population between 30.000 (in that case the sample would be 7,24%) and 50.000 (in that case the sample would be 4,34%). But they are not sure, simply because research on the whole population has never been done.

Figure 5: Response divided to sector of respondent

The intention of this survey was to get a brighter picture of the whole Dutch purchasing profession. Although it is very difficult to say that this survey



covers the whole population in all aspects, the results make clear that the response from the respondents was as broad as we hoped for. If we focus more specific on sector level (Figure 5), all sectors are more or less represented. If we compare these to the general statistics of CBS¹⁴ (year 2005), where the sectors were represented as followed: Industry (20,02%), Trade and transport (25,78%), Financial services (20,62%) and (semi-) Government (33,57%), it becomes clear that the response of the survey is not equally distributed as compared to the distribution of jobs in the CBS survey. Although the statistics of CBS give an indication about the distribution of jobs over the different sectors, these are not quite accurate. In the CBS results, just the distribution of jobs varied over the different sectors has been investigated. The distribution of purchasing jobs in particular could have a very different distribution over the different sectors.

If we zoom in on age and gender, a different picture appears. The response of women is not normally distributed over age as compared to the distribution of response from men (see Figure 6). This could be explained by the low number of women in the total response and to the fact that women could be pregnant and therefore be out of the working population. Also women above 50 are rarely observed in the survey results. Possibly, being a purchase professional was formally typified as a typical male job and that only recently (especially the last decade) women became more and more interested in these kinds of jobs.

The educational background of the respondents varies very much. Almost 69,1% had a high level of education (bachelor degree or higher), see Figure 7. Although this is very interesting

¹⁴ CBS: Centraal Bureau voor de Statistiek

for the predictive salary model, it is not representative for the education level in the Netherlands as a whole.

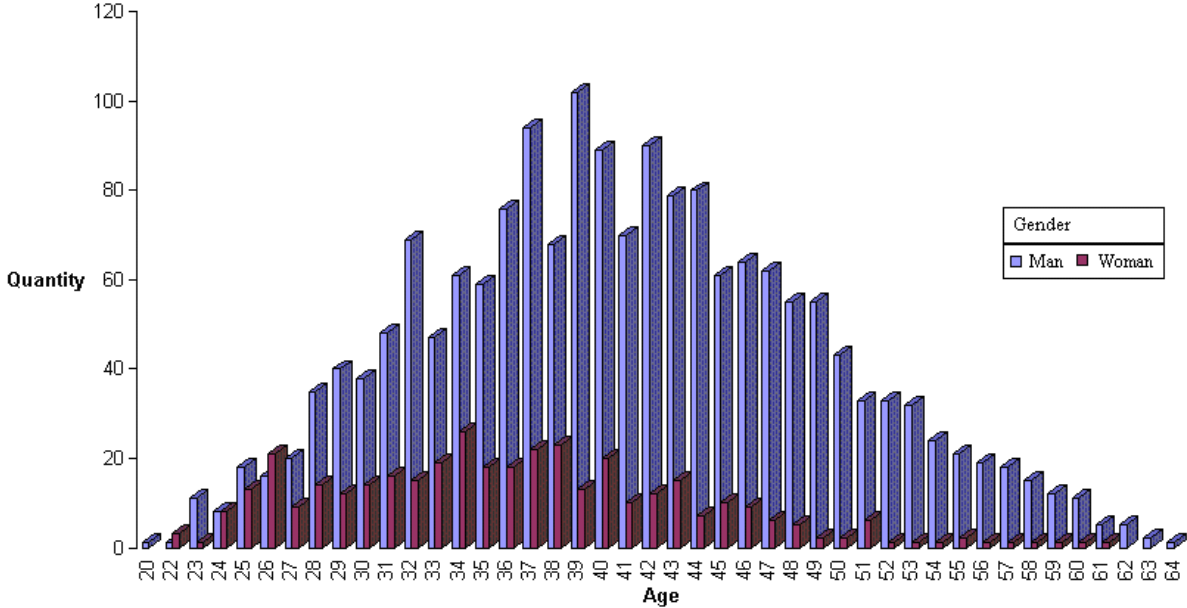


Figure 6: Response of respondents divided to gender; men N=1791, women N=380

In the whole working population in the Netherlands approximately only 10% has finished an education with a bachelors or master degree. This diversification of educational background from our respondents can be explained by the use of the databases of the participating organizations. InQuest and Berenschot work mostly for highly educated purchasing professionals and therefore they have mostly these persons in their databases, while NEVI has a broader rank and file and therefore covers more lower educated purchasing professionals. Due to the input of the several databases and the differences in number of potential respondents over the databases, this has resulted in a shift towards more highly educated purchasing professionals which could respond. This indeed happened actually.

The response by organizational level is somewhat outlined. If we take a pyramid type of organizational structure for the purchasing departments in mind, then response from staff level is under represented. This can be seen in Figure 8. A higher proportion of highly educated respondents would lead logically to a better representation of higher purchasing jobs on higher organizational levels. On the other hand, this could lead to an under representation of lower purchasing jobs. That could explain the under representation of the staff level. It's quite interesting to focus on the staff level respondents more closely. If we zoom in on this

category 44,3% had a bachelor's degree and only 6,3% had a master's degree. This is quite interesting.

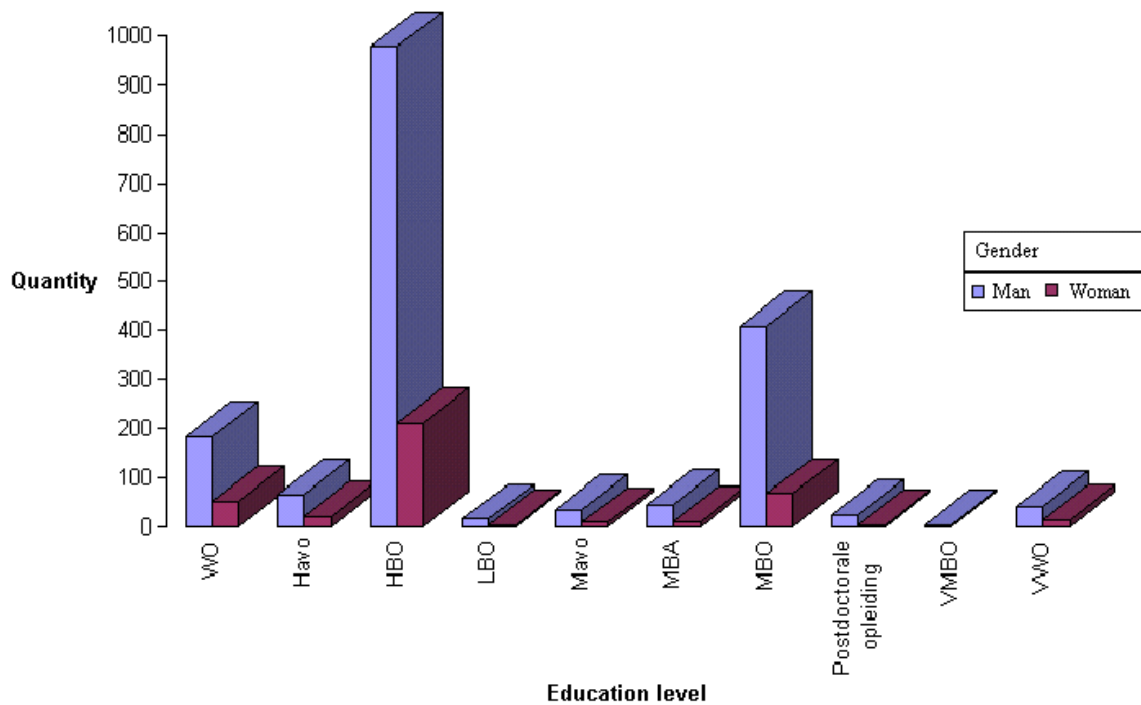


Figure 7: Educational level of respondents

Although the respondents with a bachelor's degree are very much over represented in the total response, it would be expected that the rate of purchasing professionals on staff level with a bachelor's degree to be around 10% (or maybe less). Another interesting finding is that the average age of the respondents with a bachelor degree on staff level is quite high: 35,1 year. The average age of the respondents with a master degree is much lower: 31,8 years. These results could not be explained by part-time work of women or a high(er) average age for women in this category. The average age of women in both groups was lower as compared to the average age of men. Good reasons for these results are hard to find.

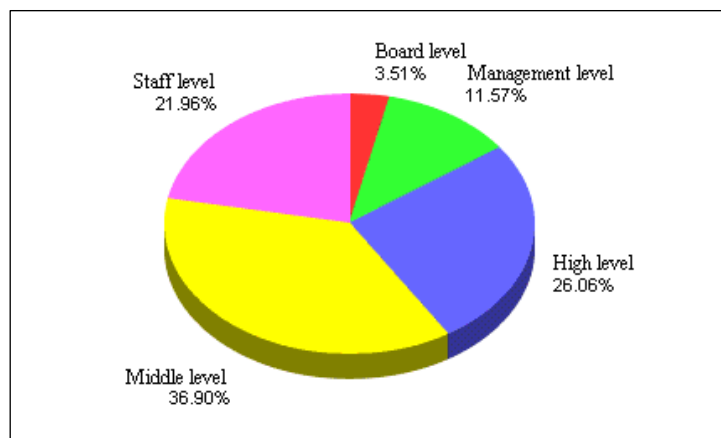


Figure 8: Response by organizational level

4.3 Conclusion

In general it is very difficult to state that these survey results are representative for the Dutch purchasing profession as a whole. The problem is that there is no clear picture about the purchasing profession, no specific data are available with which we could verify these survey results. Although comparisons with national statistics (sector and education level) are possible, these probably do not add very much.

Although the sample is outlined for educational level and some for female gender, the sample consists mostly of highly educated purchasing professionals and is therefore mostly representative for these categories of purchasing professionals. In that sense, the survey results are useful for analyzing highly educated purchasing professionals' behaviour and responsibilities. This has to be kept in mind by reading Chapter 5 in which the hypotheses will be tested.

5. Data

In this chapter, we will test our hypotheses which we have drawn up in chapter 3. In paragraph 5.1 all hypotheses will be tested, which will result in a discussion in paragraph 5.2 about the theoretical impact of these results and how these results could be explained. A short conclusion will be given in paragraph 5.3

5.1 Hypotheses

H1: Male purchasing professionals earn more base salary as compared to female purchasing professionals.

Although it is more or less generally accepted that men often earn more than women in the same jobs, this statement seems not to be true for purchasing professionals. In our regression analysis of model 1 (see Table 2, also used for other hypotheses), we found a slightly small difference of 0.6% percent in advantage of men. But this result is not significant. This indicates that no significant base salary differences were found between male and female purchasing professionals and that all salary differences could be explained by other variables which have been taken up in model 1. Our hypothesis H1 is therefore rejected.

H2: Male purchasing professionals' secondary conditions of employment are better and higher as compared to female purchasing professionals' secondary conditions of employment.

In order to test this hypothesis, the denoted accessibility to a lease car will be compared between male and female purchasing professionals. Although we wanted to test this hypothesis, SPSS was not able to perform these Logit regressions. Therefore we could not test this hypothesis.

H3: Working abroad has a positive impact on purchasing professional's denoted base salary.

Work experience in foreign countries did have a positive impact on denoted base salaries of purchasing professionals when they worked outside the Netherlands for more than three months without a pause. Although we assumed this to be very likely, our attention was more

focused on the size of the result. Purchasing professionals may expect a 5.4% higher base salary (significant at 1% level) in comparison with colleagues who didn't work abroad for more than three months. We therefore can not reject hypothesis *H3*.

H4: Purchase professionals who have finished specific procurement related education at institutions (like NEVI and APICS) get higher base salaries as compared to purchase professionals who didn't finish such educations.

In some cases it would be profitable to follow specific procurement education at well known education centres like the NEVI in the Netherlands. Following a NEVI MIL or NEVI 1 course does have a negative impact on one's earnings (only significant at 10% level) as compared to purchase professionals who didn't follow any NEVI course. Following such courses would signal low capabilities possibly. Following other courses, such as NEVI 2 (+ 3.0%), NEVI 3 (+6.9%) and ISFAH (+8.7%), do pay off. These are all significant at 1% level, except NEVI 3 which is significant at 5% level. Following an APICS course does not have a significant effect on one's denoted base salary. We do not reject the hypothesis for the specific procurement

Table 2 Regression coefficients

Model		T	Sig.
1	(Constant)	88.980	.000
	LN Age	20.186	.000
	Gender	.572	.567
	# different organizations worked for within procurement > 3 months working abroad	4.284	.000
	Director level	10.804	.000
	Management level	3.133	.002
	Middle level	-9.409	.000
	Staff level	-14.281	.000
	CPO	1.883	.060
	Director SCM	-.241	.810
	SCM BU	2.838	.005
	Initial Purchaser	-4.650	.000
	Strategic Purchaser	-1.609	.108
	Procurement/SC analyst	.194	.846
	Procurement assistant / admin. Purchaser	-4.358	.000

Staff member procurement	- .425	.671
< 1 year working for employer	.690	.490
1-3 years working for employer	-.843	.399
3-5 years working for employer	-.294	.769
5-10 years working for employer	-1.596	.111
Havo	-5.013	.000
LBO	-2.269	.023
Mavo	-3.189	.001
MBA	3.962	.000
MBO	-7.499	.000
Post doc	2.310	.021
VMBO	-.193	.847
VWO	-2.404	.016
WO	5.865	.000
NEVI 1	-1.830	.067
NEVI 2	2.606	.009
NEVI 3	2.366	.018
NEVI MIL	-1.862	.063
ISFAH	3.932	.000
APICS (together)	-.299	.765
Industry	1.140	.254
Trade and Transport	-1.267	.205
Financial services	2.184	.029
Turnover / Budget < 5 mill.	-5.288	.000
Turnover / Budget 5-10 mill.	-5.939	.000
Turnover / Budget 10-25 mill.	-7.742	.000
Turnover / Budget 25-50 mill.	-5.901	.000
Turnover / Budget 50-100 million	-5.241	.000
Turnover / Budget 100-250 million	-3.896	.000
Spent < 1 million	-6.672	.000
Spent 1-2 million	-5.317	.000
Spent 2-5 million	-4.883	.000
Spent 5-10 million	-3.244	.001
Spent 50-100 million	2.737	.006
Spent 100-500 million	6.648	.000
Spent > 500 million	7.413	.000

a Dependent Variable: LN brute salary (based on 38 hours working week)

R square = 0.724

related educations NEVI 2, NEVI 3 and ISFAH. Hypothesis *H4* is rejected for the specific procurement educations NEVI MIL, NEVI 1 and APICS.

H5: Intra-organizational mobility has a more positive impact on men's base salaries than on women's base salaries.

Switching jobs within procurement (new employer) has a positive impact on one's salary in general. A switch to a new employer will result in a 1.3% salary increase (significant at 1% level) regardless of differences in personal characteristics (like age and education) and function content (like spent responsibility). As we have seen earlier in hypothesis 1, no base salary differences were denoted between men and women. So it would be expected that the impact of intra-organizational mobility will be equal for both genders. Unfortunately, gender differences in intra-organizational mobility could not be tested, because SPSS could not perform Tobit regressions.

H6: Organizations located in densely populated areas pay higher salaries as compared to organizations located in less populated areas.

Although this would be expected, our data signal otherwise. Purchasers working at locations with a zip code below 4000 (Randstad; including large cities like Amsterdam, Rotterdam, Den Haag and Utrecht) earn 31.4% less as compared to purchaser's working outside the Randstad. This result is significant at 1% level (by R square 0.571, see Appendix 1). Hypothesis *H7* is therefore rejected. If the zip codes were narrowed to the specific zip codes for Amsterdam, Rotterdam, Den Haag and Utrecht, similar results were denoted.

5.2 Discussion

Although the results indicate that there are no gender differences, this result contrast with most academic literature. As stated in chapter 2 the procurement profession has changed a lot. Formally mostly men were working within procurement organizations, but women occupy more and more the same career paths as men nowadays, which is in line with Blau *et al.* (2002). Due to the melt together of male and female career paths, remuneration differences will narrow too. This was also denoted in the survey results. It was obvious that women were better educated as compared to men, as well as for general education as for specific procurement related education. Also women are working more and more within the

procurement profession. This trend will narrow the (so called) gap between male and female remuneration even further. Besides that, all purchasers have natural negotiation skills, which will be very useful in salary negotiations. Therefore salary negotiations will depend on how much a purchaser is well informed about his or her own market value (e.g. compared with salaries paid by competitors or other similar organizations), the expectations within his own organization (about remuneration in general) and his own effort to push it to the limit. This could vary per person (and also over gender), depending on one's negotiation skills.

Switching jobs and having worked abroad do have an obvious positive effect on base salary earnings. This is in line with what Meng and Ramaekers (2000) had discovered. Also specific procurement related education had a positive effect. Although this did not count for all researched procurement educations (NEVI MIL, NEVI 1 and APICS were not significant on 5% level), it could be that attending such educations will not be rewarded with higher base salaries. But that's not true. Respondents which followed NEVI 2, NEVI 3 or ISFAH, did get a direct rise in base salary after finishing as often as respondents who did follow NEVI MIL, NEVI 1 or APICS. In recruitment advertisements principals (e.g. HR managers or procurement management) often ask at least NEVI 2 education. Thus signalling that the knowledge gathered with educations below NEVI 2 will not be regarded as 'proper' procurement education and will therefore not be rewarded in a financial way.

The region in which an organization operates and the location where the purchasing department is settled is very important in order to attract well educated and skilled procurement professionals. Contrary to many academic researches on agglomeration effects (Ciconne, 2002) there is a negative relationship between location of the (procurement) organization and base salary. It seems that the scarcity of (good) procurement professionals in regions outside the Randstad has steamed up the base salaries denoted by these purchasing professionals. This was quite interesting and needs to be analysed in future researches. Although we did find significant results the impact of regional differences seems to be out of proportion.

5.3 Summary

The results indicate that there are no base salary differences between men and women. Although this is not expected, it could be explained by the fact that women more and more occupy male career paths. But education, working abroad and switching jobs do have a

positive effect on base salary earnings. Education is important, because this signals one's (analytical) capabilities. This applies also to procurement related education, like NEVI education. But the financial impact of such educations varies very much. Regional differences seem to have a huge influence on remuneration within the Dutch procurement profession, but future research on this subject is needed.

6. Conclusion

The Dutch purchasing profession is on the move. Globalization has stirred Dutch organizations to pay more attention to their suppliers. Many organizations have formulated a purchasing strategy or are currently working on it. To make these strategies operational, organizations have (re)organized their organization around less, but more strategically suppliers. The process of selecting these suppliers and deepening the relationships with them, have put pressure on purchasers to learn new abilities and skills.

Although the professionalization of the purchasing departments varies very much across organizations, nationwide there is a tendency towards more professional purchasing departments. The awareness of purchasers' contribution to profit realization, throughout organizations has led to the creation of purchasers' jobs at higher levels. This has led also to higher remunerations for purchasing professionals in general.

From a theoretical point of view, many variables could explain salary differences among purchasers. Choices made in the past still influence today's earned salary, such as education and type of procurement education. Education choices made in the past are one's first milestone in setting the characteristics right for well paved career opportunities.

Once a purchaser has started in an organization, he or she will get a higher salary every year (because of inflation correction and/or promotion). But one's career depends on one's ambition to learn, the ability to learn from mistakes, how to take responsibility, in understanding procurement processes and so on. The responsibilities and asked activities related to particular procurement jobs influence very much one's earned salary. Although base salary doesn't represent one's success, it is a reflection of one's abilities and capabilities. This will also be reflected in the activities a purchaser will or has undertaken in the past, such as working in a foreign country, getting additional procurement related trainings and seminars and so on. One's actual purchasing position within an organization is the result of dedication and well considered career and education choices.

Although the survey sample is outlined for educational level and some for female gender, the sample consists mostly of highly educated purchasing professionals and is therefore mostly

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The results indicate that there are no base salary differences between men and women. Although this is not expected, it could be explained by the fact that women more and more occupy male career paths. But education, working abroad and switching jobs do have a positive effect on base salary earnings. Education is important, because this signals one's (analytical) capabilities. This applies also to procurement related education, like NEVI education. But the financial impact of such educations varies very much. Regional differences seem to have a huge influence on remuneration within the Dutch procurement profession, but future research on this subject is needed.

The dual goal of the questionnaire, partly for academic use and partly for commercial use, has led to a large questionnaire but may be less in-depth on specific subjects (from an academic point of view). The questionnaire could not be too long, otherwise the questionnaire would not be filled in and result in low responses. Furthermore, additional research is needed on the population of purchasing professionals working in the Netherlands. The survey results apply for high educated purchasing professionals mostly. This could be regarded as a limitation, because low educated purchasing professionals are under represented in the survey response. Although this is true, the survey results give a good impression of the base salaries denoted in the Dutch procurement profession and of the most important determinants which influence base salary negotiations.

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Appendix I Location of organization

Model		T	Sig.
1	(Constant)	89.286	.000
	LN Age	.846	.398
	Gender (male=1 female=0)	1.511	.131
	# Different organizations worked for within procurement	-.805	.421
	> 3 months working abroad	-1.243	.214
	< 1 year working for employer	-1.243	.214
	1-3 years working for employer	-.430	.667
	3-5 years working for employer	-1.293	.196
	5-10 years working for employer	-.577	.564
	Havo	-.581	.561
	VMBO/LBO	1.585	.113
	Mavo	.697	.486
	MBA	-.594	.552
	MBO	-.211	.833
	Post doc	1.619	.106
	VWO	-1.298	.195
	WO	-1.424	.155
	Spent < 1 million	-12.978	.000
	Spent 1-2 million	-8.898	.000
	Spent 2-5 million	-8.980	.000
	Spent 5-10 million	-5.185	.000
	Spent 50-100 million	6.290	.000
	Spent 100-500 million	11.349	.000
	Spent > 500 million	15.984	.000
	Trade and Transport (Semi-) Governmental organizations	2.169	.030
	Financial services	-2.666	.008
	Turnover / Budget < 5 mill.	.671	.502
	Turnover / Budget 5-10 mill	.009	.992
	Turnover / Budget 10-25 million	-.113	.910
	Turnover / Budget 25-50 million	1.639	.101
	Turnover / Budget 50-100	.788	.431

million		
Turnover / Budget 100-250		
million	-.145	.885
Director Level	.459	.646
Management Level	1.478	.139
Middle Level	.195	.846
Staff Level	.316	.752
CPO	-1.867	.062
Director SCM	-1.600	.110
SCM BU	-2.087	.037
Initial Purchaser	-.177	.860
Strategic Purchaser	-.992	.321
Procurement / SC analyst	-1.366	.172
Procurement assistant /		
admin. Purchaser	.015	.988
Staff member Procurement	-1.426	.154
Randstad (Zip code till		
4000)	-27.719	.000

a Dependent Variable: LN bruto salary (based on 38 hours working week)

R square = 0.571

Appendix II Questionnaire ‘Career and Salary monitor Procurement 2007’

This questionnaire is in Dutch and is classified.