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# HUMAN CAPITAL DISCLOSURES AND MANAGEMENT PRACTICES

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**Abstract**

**Purpose** - The purpose of this paper is to investigate the association between annual report human capital disclosures and human capital management practices.

**Methodology** - The paper used two sets of data. Disclosure data was collected from annual reports. Data on management practices was collected by e-mail questionnaire. 16 of the most traded companies on the Stockholm Stock Exchange (SSE) were included in the study.

**Findings** - Results indicated that there is limited association between the two sets of data. Even though the association was significant on an aggregate level, more detailed testing showed no systematic associations. There was, however, a significant association between internal management practices and companies' perceived importance of disclosure, even though this was not reflected in actual disclosure.

**Research limitations** – The most important limitations of the study are that it was based on a small non-random sample of companies from only one country and used annual report disclosures from a single year. Also, the study focuses on quantity rather than quality of disclosures.

**Originality** - A feature of previous research is that it tends to focus on human capital (intellectual capital) from either an external or internal perspective. This study is the first that links human capital annual report disclosure and internal human capital management practices.

**Keywords** - Human capital, annual report disclosure, management practices

**Classification** - Research paper

# 1. Introduction[1]

In recent years we have witnessed an increasing interest in intellectual capital (IC) measurement, management and reporting. Research activities have focused on different issues (for literature reviews see e.g. Cañibano *et al.*, 2000; Bontis, 2001; Kaufmann and Schneider, 2004; Marr *et al.*, 2003; Ashton, 2005; Roos *et al.*, 2005; Abeysekera, 2006). Organizations have different motivations as to why they focus on IC. These can be classified into two broad categories; internal and external. A review of the literature by Marr *et al.* (2003) identified four main internal reasons - to help organizations formulate their strategy, assess strategy execution, assist in diversification and expansion decisions, and use IC as a basis for compensation – and, one external - to communicate measures to external stakeholders. A feature of previous research is that it tends to focus on IC from either an internal or external perspective. Few studies have empirically linked these two perspectives. The research presented in this paper focuses on the link between IC annual report disclosure and internal IC management practices.

IC can be categorized in different ways (e.g. Kaufmann and Schneider, 2004). For the purpose of this study, the focus was on a sub-category of IC, namely human capital (HC), in line with other studies such as Abeysekera and Guthrie (2004), Stittle (2004) and Stiles and Kulvisaechana (2003). According to Abeysekera and Guthrie (2004, p. 253) human capital refers to "a combination of factors possessed by individuals and the collective workforce of a firm. It can encompass knowledge, skills and technical ability; personal traits such as intelligence, energy, attitude, reliability, commitment; ability to learn, including aptitude, imagination and creativity; desire to share information, participate in a team and focus on the goals of the organisation".

The annual report is an important document because it is the principal means for corporate communication of activities and intentions to stakeholders (Holland and Boon Foo, 2003) and because it signals what is important to the reporting company through the reporting mechanism (Guthrie and Petty, 2000; April *et al*., 2003; Guthrie *et al*., 2004). Sophisticated users, such as analysts and investors, draw on annual report information in their work, to, for example, provide earnings forecasts and to justify recommendations to investors. This does not only relate to financial information, but also to non-financial information and narrative reporting (Garcia-Meca, 2005; Rutherford, 2005). Several studies point out that annual report users are requesting more and more reliable information related to key drivers, such as HC, of future company value creation capabilities  (e.g. Maines *et al*., 2002; Beattie, 2000; Healy and Palepu, 2001; Abeysekera and Guthrie, 2004). Many companies have responded to this request. Indeed, studies have identified an upward trend in the annual reporting of non-financial information and accounting narratives related to value drivers (e.g. Williams, 2001; Abeysekera and Guthrie, 2004; Vandemaele *et al*., 2005).

In this stream of research the existence of a link between annual report disclosures and internal management practices is implicitly assumed. Prior research argues that positive effects of disclosure include a reduction in cost of capital, a lower level of information asymmetry (Garcia-Meca *et al*. 2005), enhancement of stock market liquidity, and increased demand for companies´ securities (Healy and Palepu, 2001). These positive effects can only ensue if disclosures provide information about actually occurring internal management practices. In spite of the importance of the link between disclosures and management practice, the existence of the link has been scantily empirically tested. Indeed, a review of the IC literature identified no such empirical study. However, research on the link between external disclosure and internal management practices has started in the nearby field of environmental reporting (e.g. Frost and Seamer, 2002; Tilt, 2006)

Recent research gives reason to question the strength of the link. Despite the previously noted functions of the annual report, there are concerns as to why sophisticated users, despite an increasing body of literature documenting the profitability of HC investments, are ambivalent about using HC related disclosure information (Holland, 2003; Johanson, 2003; Holland and Johanson, 2003). Johanson (2003, p. 32-33) has presented four explanations to this observation. First, capital actors might be ambivalent because they don't understand how HC investments contribute to the value creation process of the firm. Second, capital market actors might be hesitant about HC information because they do not know if they could rely on HC indicators. Third, their reluctance might be connected to the lack of ownership of intangibles related to people. Fourth, capital market actors are ultimately hesitant and indecisive because they do not know if the measures in actual fact matter in the firm's management control process. This fourth explanation includes issues such as: Does management take the necessary action on data? and Is there consistency between the HC information that is disclosed externally and HC activities/programs implemented internally?

The fourth explanation is related to the previously discussed link between annual reporting disclosure and internal management practices, which is also the focus of this study. The research issue addressed is – Is there an association between annual report HC disclosures and internal HC management practices?

The remainder of the paper is organised as follows. The next section discusses the research method used. Section 3 presents the results from the study. A concluding discussion and future research emanating from the study are provided in the final section of the paper.

## 2. Research method

In order to study the issue of association between annual report disclosure and management practices two sets of data were needed. Disclosure data was collected directly from annual reports, while data on management practices was collected through an e-mail questionnaire. The empirical setting and data collection methodology will be described next.

*Empirical setting*

Comparative studies of HC annual report disclosure practices show variations between countries. For the purpose of this study it is advantageous to investigate a country where the HC idea is widely discussed. Both disclosure of and management practices on HC are expected to be well developed in Sweden, which makes the country a suitable empirical setting for studying the issue at hand.

A concept which often is used to describe both Swedish business culture and management is `stakeholder capitalism` (as opposed to `shareholder capitalism`) (Bjerke, 1999; Näsi, 1995; Grenness, 2003). This idea is based on mutual agreements and cooperation between employers, employees and other stakeholders, as well as on implicit long-term bonds between stakeholders. These implicit bonds are likely to become manifest in Swedish HC practice. There is support in the literature that employees matter in companies internal management control work. In a study of the balanced scorecard in Sweden, Ax and Bjørnenak (2005) found that a large majority of Swedish companies have developed a separate employee measurement perspective in addition to the four perspectives presented by Kaplan and Norton (1996) in their scorecards. The authors argued that this observation could partly be explained by the Swedish stakeholder business culture.

Factors which can be expected to contribute to a well developed disclosure of and management practices on HC in Sweden are the intellectual capital model presented by

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Leif Edvinsson and Skandia's work on the Navigator model (e.g. in their annual reporting) (Edvinsson and Malone, 1997). These have received substantial interest in Sweden. Actually, intangibles and intellectual capital have caught the attention of companies, as well as researchers and consultancy firms, before Leif Edvinsson and Skandia presented their ideas. Two important contributors to the field are Sveiby (1997a, 1997b) and The Konrad Group (1989) (see Ahonen and Gröjer (2005); Flamholtz *et al.*, (2002) and Vuontisjärvi (2006) for additional examples). There is also evidence showing that Sweden has a high amount of IC disclosure compared to most other countries (e.g. Vandemaele *et al.*, 2005).

*Sample of companies in the study and timing of data collection*

The most traded companies on the Stockholm Stock Exchange (SSE) were selected for inclusion in the study. All 27 Swedish companies on the A-list, most traded, which tended to cover the largest companies, were chosen. The reason for including the largest companies was that they are more likely to disclose more information than smaller companies and were assumed to have made substantial deliberation on what human resource related disclosures to include in the annual report (e.g. Marston and Shrives, 1991; Hackston and Milne, 1996; Abeysekera and Guthrie, 2005). Behind this assumption is the fact that larger companies on average have more international exposure, are likely to possess more HC, are generally more transparent, have larger analysts' following, are subject to more media exposure, and have better developed internal management systems than smaller companies. Thus, by studying large companies the impact of deliberate action on annual report disclosure is captured.

A separate issue was the timing of the data collection. An assumption was made that there is a time lag between the introduction of internal human resource programs and activities and their disclosure in annual reports. The questionnaire – measuring internal

programs – was sent out and collected in April/May 2004. Active programs or plans to start programs at that time can be expected to be disclosed in the 2005 annual report, which was released in the spring of 2006. Therefore, disclosure data from the 2005 annual reports was collected.

*Content analysis*

Content analysis of annual reports and other written material has been widely used in accounting research. "Content analysis is a research technique for making replicable and valid inferences from data according to their context" (Krippendorf, 1980, p. 21). Seen as a technique for data collection, it "is a method of codifying the text (or content) of a piece of writing into various groups (or categories) depending on selected criteria" (Milne and Adler, 1999, p 237). In IC annual report research, content analysis is used as a research method for capturing and categorizing empirical data (e.g. Gray *et al*., 1995; Milne and Adler, 1999). A number of studies have used this method to examine voluntary and mandatory annual report disclosures in different countries (for literature reviews see e.g. Guthrie *et al*., 2004; Roslender and Fincham, 2004). Studies of disclosures use several arguments for using annual reports in disclosure studies; it is a major medium for communicating information to stakeholders, it is produced regularly, the company has a substantial editorial input into it and it is widely distributed and read (e.g. Campbell, 2004).

A decision had to be made on which HC items to focus on in the data collection. In the selection of items, Bukh *et al*. (2002, 2005) was used as a starting point. Only voluntary disclosures were included in the study. It should be noted that there are some disclosure requirements in Swedish law. For example, disclosure of number of employees, separated into men and women, and absence due to sickness are required. There are also substantial disclosure requirements concerning incentive programs for top management.

These required disclosures are not included in the study. Thus, Bukh *et al*'s items were adapted to a specific Swedish setting. This resulted in 24 separate disclosure items. These are presented in Table I. As seen in the table, the 24 items were divided into 5 disclosure themes.

Take in Table I

In the literature, there is a continuing debate on which unit of analysis that should be used in annual report content analysis (Gray *et al*., 1995; Deegan and Rankin, 1996; Milne and Adler, 1999; Beattie *et al*. 2004). The debate centers on the most effective way of inferring reporting intent from volumetric data (Campbell, 2004). Much focus is on whether words, sentences or pages should be used. According to Williams (1999), the literature does not provide an overwhelming justification for any of the three units of analysis. However, the use of words and/or sentences seems to be preferred by most researchers. This study used both words and sentences as units of analysis.

In addition to the number of words and sentences, some quality aspects of disclosures were covered in the study (e.g. Guthrie *et al*., 2004). These were reporting topic and forms of evidence (the existence of monetary data, numerical data, and of tables and charts). The existence of quantitative and monetary data (hard data) could be an indication of higher importance of an item, since companies are likely to use more resources in gathering hard data rather than only providing text. Tables and charts may be provided instead of text by some companies, which is why such measures were also included (cf. Marston and Shrives, 1991). Pictures were excluded from the study because of measurement problems (cf. Wilmshurst and Frost, 2000; Guthrie *et al*., 2004). Actual results show that there is a very high correlation between words and sentences, making the two measures almost interchangeable. Measures on hard data and tables/charts are generally not as useful as

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words/sentences, so the latter do appear to be a good measure. Results on all measures are reported in the paper. In each annual report, the following information was collected for each disclosure item:

- Number of words.

- Number of sentences.

- Existence of quantitative data (a binary variable).[2]

- Existence of monetary data (a binary variable).

- Number of tables/charts.

- Total number of data points in tables/charts.

Having decided on themes and units of analysis, a checklist instrument (including decision rules) outlining criteria for assigning the identified HC disclosures to each of the 24 items was developed. Efforts were made to ensure that the checklist guaranteed that each item was unambiguous and mutually exclusive of others. The checklist was validated in a pilot-study. This step proved to be valuable since it resulted in checklist improvements. In order to ensure reliability in coding, two researchers and a research assistant were involved in the coding process. Inconsistencies in coding between the three coders were synchronized in discussions. If a single item of information was mentioned more than once, it was still only counted as one item.

Descriptive statistics on data collected from annual reports is found in Tables III, IV and V. The tables provide some interesting information. The medians in Table III show that for the majority of individual items there is no annual report disclosure at all. This is also evidenced in Table V, as there are large percentages of zeros in the data. Especially

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[2]     Existence of quantitative data and Existence of monetary data: 1 = Yes, 0 = No.

the variables "quantitative data" and "monetary data" have a large number of zeros. This means there is not much disclosure of this type. The same is true for tables and charts. They are not common in the disclosure. This makes these last four variables more difficult to work with statistically. And, as is evident in the next section, these variables are mostly not significantly correlated to the questionnaire data.

Table IV indicates that there is substantial variation in the level of disclosure between different companies, for example between Stora Enso and SCA, even though they are in the same industry. There is also a large variation in the level of disclosure of different items in the themes. "Revenues and employees" is hardly disclosed at all, while "staff health and job satisfaction" appears to be important themes.

An assumption made in this study was that quantity (amount) of disclosure for a specific item is related to the importance of that item. This seems to be a frequent assumptions in the literature (e.g. Gray *et al*., 1995; Deegan and Rankin, 1996; Neu *et al*., 1998; Unerman, 2000; Frost and Seamer, 2002; Guthrie *et al*., 2004). Given that producing annual reports is costly, and that there is competing demands for space in the reports, the quantity of disclosures should reflect relative importance of different items (Wilmshurst and Frost, 2000).

*E-mail questionnaire*

The questionnaire was sent to 27 Swedish companies. Out of these 16 responded, giving a response rate of 59%. In all 27 cases, the questionnaire was sent to the Chief Financial Officer (CFO) of the company. The CFO was considered a relevant proxy for the views of the entire company (cf. Wilmshurst and Frost, 2000). For analysis purposes, companies are classified by industry. The classification follows the classification done by Affärsvärlden, a leading Swedish business magazine. A list of all usable company

observations is provided in Table II. It also shows the industry for the companies included in the study, i.e. for those that replied to the questionnaire.

The questionnaire was about the group level rather than parent company or subsidiaries, the assumption being that strategic HC decisions are made at the group level.

Take in Table II

There were three questions in the questionnaire (see Appendix 1). In the first question respondents were asked to rate the importance for each of the 24 disclosure items on an anchored Likert scale from 1 through 7. It was also possible to answer "not at all", which was coded as 0. Likert scales are relevant in ascertaining relative importance of various items (e.g. Frost and Wilmshurst, 2000). Importance was defined in terms of actual management practices on the 24 items. Especially, activities indicated through company policies, strategies, action plans, etc. were asked for. The second question was about the importance of addressing different intended recipients of each disclosure theme rated on a seven point Likert scale. In the third question the respondents were asked to rate the importance of the five disclosure themes for different stakeholders. The same type of Likert scale was used here as in the first and second question. Descriptive statistics on questionnaire responses is provided in Table III. It is evident from the means of responses to Question 2 in the table that companies focus on employees (and unions) and owners (which also include investors and their advisors, such as analysts) in their disclosure. Suppliers and customers are not important. This may not be surprising, but perhaps more unexpected is the low importance in disclosing for NGO's, governments and the general public.

Take in Tables III, IV and V

A test was made for non-response bias by comparing early and late respondents, the assumption being that non-respondents are more similar to late respondents. A Mann-Whitney test was used to compare the two groups of respondents (cf. Wilmshurst and Frost, 2000). When comparing responses by item, in no case could the null hypothesis be rejected at a 5 % significance level. This gives an indication that non-respondents are not significantly different from respondents.

In the study, the association between questionnaire answers and disclosures in annual reports was tested. This was done with methods based on ranking of the data. The nature of the data limits statistical methods available. Parametric test cannot be used since the data is not normally distributed. For example, there is a strong skewness in the annual report disclosure data, as evidenced by the differences between means and medians in Table III, as well as the high percentage of zeros in Table V. Also, some of the variables are binary. Plotting the data further indicated that it is not normally distributed. In addition, parametric tests based on comparisons of means were not used, since the questionnaire and the annual report disclosure data do not have comparable means. They follow different underlying data distributions.

Non-parametric ranking tests were used. Pearson's correlation requires linearity in the data. Our testing indicated that the data is non-linear, which left us with a choice of Spearman's rho and Kendall's tau (cf. Marston and Shrives, 1991). According to Conover (1980) these two tend to give almost identical results in most situations. This was true for our data as well. Therefore, only results for Spearman's rho are presented in the next section. One-tailed tests are used, since the data is only tested for positive correlations.

**3. Results**

      Initially, the association between disclosure items and the corresponding item in the e-mail questionnaire was tested. Thus, the study measured to what extent there is correspondence between importance of an item as rated by the company, and the level (amount) of disclosure of that item in the annual report. The testing was done on both the entire sample, as well as for the subcategories company, industry, and disclosure theme.

      Rank correlations for the entire sample are presented in Table VI. As evidenced in the table, the variables "number of words" and "number of sentences" are significantly correlated with questionnaire replies. It should be noted that the Spearman rank correlation between "number of words" and "number of sentences" is 99.5 %. Thus, the two variables are interchangeable in the sample. The correlation between "number of tables/charts" and "data points in tables/charts" is 99.4%. So, those two variables are also interchangeable. In addition, there is significant correlation between most disclosure variables, so they are to some extent interchangeable with each other, although not to the extent of the two pairs of variables just mentioned.

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Take in Tables VI and VII

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      Next, a test was made for additional structure in the data, by asking the question of to what extent correlations for the entire sample are driven by correlations for specific companies, industries, or disclosure themes. Results provided in Table VII indicate that the overall correlation is driven by a few companies, industries, and disclosure themes. Panel A shows that Holmen has an especially significant correlation between the questionnaire responses and "number of words" and "number of sentences". There is some significance for Skandia, Stora Enso, and Volvo. In addition, it appears that Holmen uses quantitative

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disclosures to provide information, as does SKF and Stora Enso. SKF is the only company that discloses internal program by using tables and charts. In summary, it can be concluded that for most individual companies there is no significant correlation between management practices on HC and disclosure in the annual report.

One possible explanation for the pattern is that results are driven by industry. In Panel B of Table VII it is evident that commodities is the industry with the greatest correlation, followed by financial firms. Further, looking at Panel C, it can be concluded that the correlation is driven especially by disclosures in the area of "education and training", and to some extent by "staff health and job satisfaction". It is not entirely apparent how "education and training" is related to industries such as commodities. But, "staff health and job satisfaction" could be an important area in heavy industries such as commodities (with possibly many injuries). Thus, it is difficult to see any systematic pattern, but for the majority of companies, industries and disclosure themes there is no significant correlation.

The weak results for individual companies and industries could be caused by data issues. For example, it could be caused by the large number of zeros in the data. Therefore, a test was made for the entire sample after removing all zero observations. Then there was no significant correlation at all, so this did not seem to be the explanation.

A separate issue is that the items identified in the study came from the disclosure literature, and may therefore not be suitable when measuring management practices in companies. Especially, this may pertain to items 14 and 15 ("education and training expenses", and "employee expenses per employee"), as they may be a consequence of internal strategies, rather than strategies per se. The correlation after removing these two items was tested, but that only led to a slight weakening of results. Thus, this issue does not provide the explanation for weak overall results.

Instead of trying to find a statistical, model-related explanation for the weak and unsystematic results, the study continued by trying to understand the companies´ reasoning behind their HC disclosure strategies, and how this could be related to their management practices. Additional statistical tests based on Questions 2 and 3 in the questionnaire, as well as the previously used data, were made. In Questions 2 and 3 an attempt was made to measure the importance of disclosures as stated by company representatives. The annual report study, on the other hand, measures importance of disclosure as evidenced by actual action by companies. Thus, the distinction between the two sets of data is that they measure perceived importance and action, respectively.

Question 2 in the questionnaire was about the importance of different stakeholders when companies choose to make disclosures. Question 3 is about the importance of different disclosure themes to stakeholders in general. These questions were asked by disclosure theme, which is different from Question 1, which was asked by individual item. Thus, when testing for correlations between answers to Questions 2 and 3 and annual report disclosures, the disclosure data hade to be grouped into themes. Descriptive statistics on disclosure items grouped by theme are presented in Table VIII (cf. Table III). Some descriptive statistics on Questions 2 and 3 are found in Table III, and additional statistics on these questions are presented in Table IX.


Take in Tables VIII and IX


Table IX, Panel A shows that there is a wide variation in overall perceived importance of disclosure by companies. The answers to Question 3 vary from 3.4 to 6.2 on a 7-point scale. Nordea and SCA focus especially on employees, while most companies do not see NGO's as a stakeholder for their disclosure. Panel C indicates that the area of "staff

health and job satisfaction" is especially relevant for employees and unions, as might be expected.


Take in Table X


Table X reports results from the rank correlations between answers to Questions 2 and 3, and both annual report disclosure data and answers to Question 1. The first column in the table presents the correlation between perceived importance of working with HC internally (Question 1) and perceived importance of disclosing information about this work to different stakeholders (Question 2). There is a significant correlation between working with HC internally, and wanting to disclose to employees, suppliers and owners. The correlation with employees and owners could be expected, but there is no apparent explanation for correlation with suppliers. There is a strong and highly significant correlation between working with HC, and regarding disclosure about HC as important (Question 3).

There are also some significant correlations in the other columns of Table X. Companies that perceive it important to disclose to the general public tend to write more words and sentences, i.e. more text. To some extent this relationship is also true for those that disclose to unions. Companies that want to disclose to customers and suppliers tend to disclose more monetary data. Finally, in disclosing to governments and the general public, companies tend to include more data points in tables and charts. It is difficult to see any systematic pattern in these results.

These additional statistical tests suggest that there is agreement as regards management practices as stated by the companies and perceived importance of disclosure. However, actual disclosure behavior does not seem to agree with perceived importance for disclosure. These results should be interpreted with some caution since they are grouped by

disclosure theme rather than disclosure item. When grouping data by theme, the previously noted significant correlations between answers to Question 1 and annual report disclosure data (cf. Table VI) is not there anymore. Table XI reports rank correlation for grouped data, and there is no significance.

Take in Table XI

## 4. Discussion and suggestions for future research

This exploratory study represents one of the first attempts at exploring the association between annual report HC disclosure and internal HC management practices. Even though the association was statistically significant on an aggregate level, more detailed testing showed weak associations for most individual companies and industries. Thus, the results do not provide much support for the existence of a link between external HC disclosure and internal HC management practices. However, the results provide some indication that there is a link between management practices as stated by the companies and perceived importance of disclosure, although this is not reflected in actual disclosure.

The lack of stronger results might be explained by circumstances related to disclosure strategy and to internal measurement difficulties. Disclosure of information may impact the company negatively. First, strategic information could be provided to competitors. This could relate to both positive (e.g. critical success factors) and negative (e.g. low level of employee satisfaction) aspects of the company (e.g. Williams, 2001; Marr *et al*., 2003). Second, there are potential costs of disclosure in relation to company stakeholders (Williams, 2001). For example, disclosure might attract unwanted political attention (ibid.), and providing "too much" information to unions or employees may restrict the company's flexibility (and raise worries over legal issues) (Stiles and Kulvisaechana, 2003). Third,

companies may refrain from disclosures because of the extra costs associated with the collection and disclosure of the information (Rylander *et al*., 2000; Marr *et al*., 2003). Fourth, there might be a lack of knowledge about how to measure and report IC in a systematic way because there is no common framework for measuring and reporting (Roslender and Fincham, 2004; Guthrie and Petty, 2000).

The lack of stronger results could also be caused by study limitations. First, the results from the study are based on a small non-random sample including only Swedish companies. These circumstances reduce the external validity of the results. Future studies could replicate or extend the study using a larger sample of companies and cover other geographical areas. Second, the study focused on annual report disclosures. This may have resulted in an incomplete representation of disclosure practices. Future studies could explore supplementary corporate communications channels such as corporate websites, press releases, corporate brochures, and presentations to analysts. Third, the study focused on quantity rather than quality of disclosures. This might have resulted in information loss. Future studies could focus more on the quality and type of information disclosed (i.e. the information content). Fourth, the study focused on a single year's annual report. Future research could extend the time period covered in order to observe the development of disclosures and management practices over time. A fifth limitation concerns the measurement of internal management practices. The study did not try to measure in detail what HC work that was actually performed in the companies. This could be investigated in more detail. Finally, answers to Questions 2 and 3 are grouped by disclosure themes rather than items. This might be too crude a measure. Comparing results in Tables VI and XI could suggest a problem using disclosure themes instead of individual disclosure items.

Future research could utilize complementary or competing theoretical perspectives on voluntary disclosure. This study has adopted a decision-usefulness

perspective. Consequently, an assumption is made that companies disclose information on HC activities because users find this information useful for decision-making. Other theories, e.g. stakeholder theory, legitimacy theory, political economy of accounting theory or neo-institutional theory, present other explanations for or drivers of voluntary disclosure practice (see e.g. Gray *et al*., 1995; Guthrie *et al*., 2001).

Most research on disclosure practice uses the survey method for collecting data. Future research could consider using field based methods. This could include interviewing managers about their disclosure rationale.

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**Table I. Parameters used in questionnaire and annual report study**

| Disclosure theme | Disclosure item |
|---|---|
| A. Staff breakdown | 1. Staff breakdown by age |
| | 2. Staff breakdown by seniority |
| | 3. Staff breakdown by gender |
| | 4. Staff breakdown by nationality |
| | 5. Staff breakdown by department |
| | 6. Staff breakdown by level of education |
| B. Staff health and job satisfaction | 7. Rate of staff turnover |
| | 8. Comments on changes in number of employees |
| | 9. Staff health and safety |
| | 10. Absence |
| | 11. Staff interview |
| | 12. Work environment |
| C. Education and training | 13. Statement of policy on competence development programs |
| | 14. Education and training expenses / employee |
| | 15. Employee expenses / employee |
| D. Recruitment, careers and compensation | 16. Recruitment policies |
| | 17. Job rotation opportunities |
| | 18. Career opportunities |
| | 19. Remuneration system |
| | 20. Employee incentive program |
| | 21. Policy on fringe benefits |
| E. Revenues and employees | 22. Dependence on key personnel |
| | 23. Revenues / employee |
| | 24. Value added / employee |

**Table II. List of companies included in the study**

| Companies that replied to questionnaire | |
|---|---|
| *Company* | *Industry* |
| Atlas Copco | Industrial |
| Ericsson | Telecommunications |
| Föreningssparbanken | Financial |
| Holmen | Commodities |
| Gambro | Healthcare |
| Handelsbanken | Financial |
| Nordea | Financial |
| SCA | Commodities |
| SEB | Financial |
| Skandia | Financial |
| Skanska | Industrial |
| SKF | Industrial |
| SSAB | Commodities |
| Stora Enso | Commodities |
| TeliaSonera | Telecommunications |
| Volvo | Industrial |

**Table III. Descriptive statistics, all observations**

| Variable | N | Minimum | Maximum | Mean | Standard Deviation | Median |
|---|---|---|---|---|---|---|
| *Annual report disclosure* | | | | | | |
| Number of words | 384 | .00 | 961.00 | 46.871 | 100.219 | 0 |
| Number of sentences | 384 | .00 | 51.00 | 2.719 | 5.821 | 0 |
| Quantitative data (Y/N) | 384 | .00 | 1.00 | .268 | .444 | 0 |
| Monetary data (Y/N) | 384 | .00 | 1.00 | .047 | .212 | 0 |
| Number of tables, etc | 384 | .00 | 19.00 | .344 | 1.406 | 0 |
| Data points, tables, etc | 384 | .00 | 168.00 | 4.508 | 16.357 | 0 |
| *Questionnaire* | | | | | | |
| Question 1 | 382 | .00 | 7.00 | 4.890 | 1.560 | 5 |
| Question 2, Customers | 70 | .00 | 6.00 | 1.486 | 7.797 | 1 |
| Question 2, Employees | 70 | .00 | 7.00 | 5.176 | 1.358 | 5 |
| Question 2, Suppliers | 70 | .00 | 5.00 | .943 | 1.569 | 0 |
| Question 2, Government | 70 | .00 | 6.00 | 2.360 | 1.925 | 2 |
| Question 2, Owners | 70 | .00 | 7.00 | 4.400 | 2.344 | 5 |
| Question 2, General public | 70 | .00 | 6.00 | 2.863 | 1.961 | 3 |
| Question 2, NGO's | 70 | .00 | 6.00 | 1.029 | 1.519 | 0 |
| Question 2, Unions | 70 | .00 | 7.00 | 4.185 | 2.139 | 5 |
| Question 3 | 75 | 2.00 | 7.00 | 5.280 | 1.122 | 5 |

**Table IV. Descriptive statistics. Mean, by company, industry, disclosure theme, and disclosure item**

| *Panel A: Mean, by company* | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| Company | N | Question 1 | Number of Words | Number of Sentences | Quanti-tative Data | Monetary Data | Number of Tables | Data Points, Tables |
| Atlas Copco | 24 | 4.13 | 73.5 | 4.42 | .38 | .04 | .38 | 1.29 |
| Ericsson | 24 | 3.83 | 35.2 | 1.58 | .04 | .00 | .08 | .58 |
| Föreningssparb. | 24 | 5.83 | 36.7 | 2.62 | .38 | .12 | .33 | 3.58 |
| Holmen | 24 | 4.88 | 26.1 | 1.96 | .29 | .08 | .25 | .46 |
| Gambro | 24 | 3.50 | 63.6 | 3.83 | .33 | .00 | .42 | 1.50 |
| Handelsbanken | 24 | 4.29 | 38.0 | 2.54 | .29 | .04 | .38 | 9.25 |
| Nordea | 24 | 5.62 | 42.2 | 2.21 | .42 | .08 | .25 | 4.29 |
| SCA | 24 | 5.88 | 25.5 | 1.46 | .21 | .04 | .38 | 1.25 |
| SEB | 24 | 4.75 | 40.5 | 2.12 | .50 | .12 | .62 | 7.08 |
| Skandia | 24 | 4.54 | 28.3 | 1.37 | .12 | .04 | .88 | 5.79 |
| Skanska | 24 | 3.88 | 77.2 | 4.50 | .33 | .00 | .29 | 2.79 |
| SKF | 24 | 4.83 | 38.8 | 1.96 | .17 | .00 | .38 | 7.21 |
| SSAB | 24 | 5.71 | 19.3 | 1.25 | .21 | .12 | .17 | 5.00 |
| Stora Enso | 24 | 5.58 | 116.2 | 6.92 | .38 | .00 | .46 | 10.71 |
| TeliaSonera | 24 | 5.54 | 32.2 | 1.79 | .12 | .04 | .08 | 2.58 |
| Volvo | 24 | 5.46 | 56.3 | 2.96 | .12 | .00 | .17 | 8.75 |
| | | | | | | | | |
| *Panel B: Mean, by industry* | | | | | | | | |
| Company | N | Question 1 | Number of Words | Number of Sentences | Quanti-tative Data | Monetary Data | Number of Tables | Data Points, Tables |
| Industrial | 96 | 4.58 | 61.5 | 3.46 | .25 | .01 | .30 | 5.01 |
| Telecom | 48 | 4.69 | 33.7 | 1.69 | .08 | .02 | .08 | 1.58 |
| Financial | 120 | 5.00 | 37.1 | 2.17 | .34 | .08 | .49 | 6.00 |
| Commodities | 96 | 5.51 | 46.8 | 2.90 | .27 | .06 | .31 | 4.35 |
| Healthcare | 24 | 3.50 | 63.6 | 3.83 | .33 | .00 | .42 | 1.50 |
| | | | | | | | | |
| *Panel C: Mean, by disclosure theme* | | | | | | | | |
| Company | N | Question 1 | Number of Words | Number of Sentences | Quanti-tative Data | Monetary Data | Number of Tables | Data Points, Tables |
| A. Staff breakdown | 96 | 4.35 | 25.4 | 1.64 | .44 | .02 | 1.07 | 12.01 |
| B. Staff health and job satisfaction | 96 | 5.58 | 83.4 | 4.65 | .35 | .02 | .21 | 5.10 |
| C. Education and training | 48 | 4.50 | 69.4 | 4.33 | .19 | .17 | .17 | 1.77 |
| D. Recruitment, careers and comp. | 96 | 5.03 | 43.9 | 2.42 | .19 | .05 | .00 | .00 |
| E. Revenues and employees | 48 | 4.69 | .1 | .01 | .00 | .02 | .02 | .06 |

| Panel D: Mean, by disclosure item | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| Company | N | Question 1 | Number of Words | Number of Sentences | Quantitative Data | Monetary Data | Number of Tables | Data Points, Tables |
| 1. Age | 16 | 4.12 | 9.3 | .47 | .50 | .00 | .50 | 26.81 |
| 2. Seniority | 16 | 4.44 | 1.6 | .12 | .06 | .00 | .00 | .00 |
| 3. Gender | 16 | 4.38 | 63.0 | 3.69 | .69 | .00 | .31 | 14.25 |
| 4. Nationality | 16 | 3.56 | 60.7 | 3.48 | .19 | .00 | .06 | .44 |
| 5. Department | 16 | 4.88 | 16.1 | 1.88 | .94 | .12 | 5.38 | 29.62 |
| 6. Education | 16 | 4.75 | 1.7 | .19 | .25 | .00 | .19 | .94 |
| 7. Turnover | 16 | 4.75 | .6 | .06 | .25 | .00 | .19 | 4.62 |
| 8. Changes in empl. | 16 | 5.25 | 81.4 | 5.12 | .62 | .12 | .50 | 12.62 |
| 9. Health/safety | 16 | 5.88 | 149.9 | 8.27 | .44 | .00 | .38 | 11.00 |
| 10. Absence | 16 | 5.81 | 14.1 | .96 | .12 | .00 | .00 | .00 |
| 11. Staff interview | 16 | 6.31 | 161.2 | 8.52 | .25 | .00 | .00 | .00 |
| 12. Work environm. | 16 | 5.50 | 93.2 | 4.95 | .44 | .00 | .19 | 2.38 |
| 13. Compet. dev. | 16 | 5.69 | 195.5 | 12.04 | .50 | .00 | .06 | .19 |
| 14. Education/train. | 16 | 3.50 | 4.2 | .31 | .00 | .19 | .12 | 1.25 |
| 15. Expenses/empl. | 16 | 4.31 | 8.4 | .62 | .06 | .31 | .31 | 3.88 |
| 16. Recruitment | 16 | 4.94 | 64.2 | 3.79 | .19 | .06 | .00 | .00 |
| 17. Job rotation | 16 | 4.07 | 40.4 | 2.00 | .31 | .00 | .00 | .00 |
| 18. Career opport. | 16 | 4.69 | 106.8 | 5.92 | .56 | .00 | .00 | .00 |
| 19. Remuneration | 16 | 5.69 | 9.5 | .53 | .00 | .00 | .00 | .00 |
| 20. Incentive progr. | 16 | 5.38 | 39.2 | 2.16 | .06 | .25 | .00 | .00 |
| 21. Fringe benefits | 16 | 5.40 | 3.44 | .12 | .00 | .00 | .00 | .00 |
| 22. Key personnel | 16 | 5.50 | .44 | .03 | .00 | .00 | .00 | .00 |
| 23. Rev./employee | 16 | 4.38 | .00 | .00 | .00 | .00 | .00 | .00 |
| 24. Value added/ employee | 16 | 4.19 | .00 | .00 | .00 | .06 | .06 | .19 |

The disclosure items in Panel D are described more in Table 1.


## Table V. Number of 'zeros' in the data

| Variable | N (valid obs.) | Zero, number | Zero, % |
|---|---|---|---|
| Questionnaire, Question 1 | 382 | 2 | .5 |
| Number of words | 384 | 209 | 54.4 |
| Number of sentences | 384 | 209 | 54.4 |
| Quantitative data (Y/N) | 384 | 281 | 73.2 |
| Monetary data (Y/N) | 384 | 366 | 95.3 |
| Number of tables, etc | 384 | 325 | 84.6 |
| Data points, tables, etc | 384 | 325 | 84.6 |

**Table VI. Rank correlations, entire sample**

| Annual report variable | N | Spearman's rho |
|---|---|---|
| Number of words | 382 | .134**<br>(.004) |
| Number of sentences | 382 | .134**<br>(.004) |
| Quantitative data | 382 | .061<br>(.119) |
| Monetary data | 382 | -.011<br>(.415) |
| Number of tables/charts | 382 | -.051<br>(.162) |
| Data points, tables/charts | 382 | -.054<br>(.144) |

** Significant at 1 % level (one-tailed).
* Significant at 5 % level (one-tailed).


**Table VII. Rank correlations, by company, industry, and disclosure theme**

| Panel A: Rank correlations by company | | | | | | | |
|---|---|---|---|---|---|---|---|
| Company | N | Words | Sentences | Quantitative Data | Monetary Data | Tables | Data Points |
| Atlas Copco | 23 | .090<br>(.341) | .090<br>(.341) | .120<br>(.293) | -.321<br>(.067) | -.241<br>(.134) | -.240<br>(.135) |
| Ericsson | 24 | .219<br>(.152) | .206<br>(.168) | -.277<br>(.095) | N/A | -.277<br>(.095) | -.277<br>(.095) |
| Förenings-sparbanken | 23 | .242<br>(.133) | .260<br>(.115) | -.290<br>(.090) | .164<br>(.228) | -.070<br>(.376) | -.127<br>(.282) |
| Holmen | 24 | .572**<br>(.002) | .501**<br>(.006) | .488**<br>(.008) | -.136<br>(.264) | -.294<br>(.082) | -.294<br>(.082) |
| Gambro | 24 | .276<br>(.096) | .361*<br>(.041) | -.131<br>(.272) | N/A | -.331<br>(.057) | -.323<br>(.062) |
| Handels-banken | 24 | .053<br>(.403) | .046<br>(.416) | -.102<br>(.318) | -.154<br>(.236) | -.124<br>(.281) | -.196<br>(.179) |
| Nordea | 24 | .163<br>(.223) | .115<br>(.296) | .259<br>(.111) | -.231<br>(.139) | .011<br>(.480) | .000<br>(.500) |
| SCA | 24 | .102<br>(.317) | .141<br>(.256) | .086<br>(.345) | -.190<br>(.187) | .283<br>(.132) | .283<br>(.132) |
| SEB | 24 | -.020<br>(.464) | -.020<br>(.460) | -.071<br>(.370) | .069<br>(.375) | -.180<br>(.199) | -.230<br>(.140) |
| Skandia | 24 | .380*<br>(.033) | .392*<br>(.029) | -.076<br>(.361) | .095<br>(.330) | -.194<br>(.182) | -.266<br>(.144) |
| Skanska | 24 | -.002<br>(.495) | -.009<br>(.483) | .164<br>(.222) | N/A | .000<br>(.500) | .000<br>(.500) |
| SKF | 24 | .089<br>(.340) | .089<br>(.340) | .514**<br>(.005) | N/A | .399*<br>(.027) | .392*<br>(.029) |
| SSAB | 24 | .279<br>(.093) | .244<br>(.125) | .127<br>(.278) | -.058<br>(.393) | .095<br>(.329) | .100<br>(.321) |

| Company | N | Words | Sentences | Quantitative Data | Monetary Data | Tables | Data Points |
|---|---|---|---|---|---|---|---|
| Stora Enso | 24 | .353* (.045) | .345* (.049) | .402* (.026) | N/A | .146 (.248) | .125 (.280) |
| TeliaSonera | 24 | -.077 (.361) | -.105 (.312) | -.273 (.098) | -.109 (.306) | -.158 (.230) | -.158 (.231) |
| Volvo | 24 | .399* (.027) | .433* (.017) | .048 (.412) | N/A | -.183 (.196) | -.183 (.196) |
| | | | | | | | |

**Panel B: Rank correlations by industry**

| Industry | N | Words | Sentences | Quantitative Data | Monetary Data | Tables | Data Points |
|---|---|---|---|---|---|---|---|
| Industrial | 95 | .098 (.173) | .093 (.184) | .054 (.302) | -.173 (.047) | -.076 (.232) | -.072 (.243) |
| Telecom | 48 | .048 (.373) | .039 (.396) | -.127 (.195) | .021 (.443) | -.113 (.222) | -.107 (.234) |
| Financial | 119 | .170* (.032) | .168* (.034) | .013 (.443) | .022 (.408) | -.057 (.271) | -.102 (.134) |
| Commod-ities | 96 | .270** (.004) | .254** (.006) | .248** (.007) | -.122 (.119) | .063 (.272) | .067 (.258) |
| Healthcare | 24 | .276 (.096) | .361 (.041) | -.131 (.272) | N/A | -.331 (.057) | -.323 (.062) |
| | | | | | | | |

**Panel C: Rank correlations by disclosure theme**

| Company | N | Words | Sentences | Quantitative Data | Monetary Data | Tables | Data Points |
|---|---|---|---|---|---|---|---|
| Staff breakdown | 96 | -.116 (.130) | -.109 (.144) | .120 (.123) | .046 (.330) | .082 (.213) | .053 (.303) |
| Health and satisfaction | 96 | .239** (.009) | .232* (.011) | .096 (.176) | -.029 (.391) | -.062 (.275) | -.069 (.251) |
| Education, training | 48 | .414** (.002) | .430** (.001) | .215 (.071) | -.014 (.461) | -.117 (.215) | -.131 (.187) |
| Recruiting, compens. | 94 | -.083 (.212) | -.074 (.241) | -.138 (.092) | .111 (.142) | N/A | N/A |
| Revenues, employees | 48 | .011 (.471) | .011 (.471) | N/A | -.247 (.045) | -.247 (.045) | -.247 (.045) |

** Significant at 1 % level (one-tailed).

* Significant at 5 % level (one-tailed).


**Table VIII. Descriptive statistics, Questionnaire and Annual Report Data, grouped by disclosure theme**

| Variable | N | Minimum | Maximum | Mean | Standard Deviation | Median |
|---|---|---|---|---|---|---|
| Questionnaire, Question 1 | 80 | 1.67 | 7.00 | 4.831 | 1.180 | 4.833 |
| Number of words | 80 | .00 | 347.38 | 44.452 | 52.282 | 35.125 |
| Number of sentences | 80 | .00 | 20.25 | 2.608 | 3.150 | 1.979 |
| Quantitative data (Y/N) | 80 | .00 | .67 | .233 | .234 | .167 |
| Monetary data (Y/N) | 80 | .00 | .67 | .056 | .135 | .000 |
| Number of tables, etc | 80 | .00 | 3.50 | .293 | .548 | .000 |
| Data points, tables, etc | 80 | .00 | 37.17 | 3.789 | 7.426 | .000 |

**Table IX. Descriptive statistics, Questions 2 and 3. Mean, by company, industry, and disclosure theme**

| Panel A: Mean, by company | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | Question 2 | | | | | | | | |
| Company | N | Cus-tomers | Emp-loyees | Supp-liers | Gover-nment | Own-ers | Gen.. Public | NGO | Unions | Q3 |
| Atlas Copco | 5 | .0 | 4.0 | .0 | 1.8 | 4.6 | 5.0 | 2.2 | 2.0 | 3.4 |
| Ericsson** | 5 | .0 | 3.2 | .0 | .6 | 2.1 | 2.2 | 1.6 | 3.9 | 4.6 |
| Föreningssp.** | 5 | 1.7 | 5.3 | .6 | 1.3 | 4.2 | 2.2 | .0 | .0 | 6.2 |
| Holmen** | 5 | 1.1 | 5.3 | .0 | 1.3 | 3.1 | 2.2 | .0 | 4.9 | 5.2 |
| Gambro | 5 | 3.0 | 4.2 | .0 | 2.0 | 4.0 | 3.4 | .0 | 3.4 | 5.2 |
| Handelsbanken | 5 | 2.2 | 5.4 | .0 | 3.0 | 4.6 | 3.8 | 1.6 | 5.4 | 3.8 |
| Nordea | 5 | 4.6 | 6.6 | 4.2 | 4.2 | 6.2 | 3.0 | 3.0 | 6.4 | 6.0 |
| SCA | 5 | .0 | 6.6 | .0 | .0 | 5.6 | .0 | .0 | 2.4 | 6.2 |
| SEB | 5 | .6 | 5.0 | 2.6 | 1.2 | 5.4 | 1.0 | .4 | 4.6 | 5.4 |
| Skandia | 5 | 1.4 | 5.0 | 2.4 | 2.2 | 3.0 | 2.0 | .0 | 4.8 | 4.2 |
| Skanska | 5 | .6 | 5.0 | .0 | 3.0 | 7.0 | 3.8 | .0 | 4.6 | 5.6 |
| SKF | 5 | 3.2 | 5.6 | 1.6 | 4.8 | 5.6 | 2.8 | .0 | 5.6 | 5.6 |
| SSAB | 5 | 2.4 | 5.6 | 1.8 | 2.2 | 6.0 | 3.2 | 2.2 | 4.6 | 6.0 |
| Stora Enso* | 0 | - | - | - | - | - | - | - | - | 6.2 |
| TeliaSonera* | 0 | - | - | - | - | - | - | - | - | - |
| Volvo | 5 | .0 | 5.6 | .0 | 5.4 | .2 | 5.4 | 3.4 | 6.0 | 5.6 |

| Panel B: Mean, by industry | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | Question 2 | | | | | | | | |
| Company | N | Cus-tomers | Emp-loyees | Supp-liers | Gover-nment | Own-ers | Gen. Public | NGO | Unions | Q3 |
| Industrial | 20 | 1.0 | 5.0 | .4 | 3.8 | 4.4 | 4.2 | 1.4 | 4.6 | 5.0 |
| Telecom | 5 | .0 | 3.2 | .0 | .6 | 2.1 | 2.2 | 1.6 | 3.9 | 4.6 |
| Financial | 25 | 2.1 | 5.5 | 2.0 | 2.4 | 4.7 | 2.4 | 1.0 | 4.2 | 5.1 |
| Commodities | 15 | 1.2 | 5.8 | .6 | 1.2 | 4.9 | 1.8 | .7 | 2.0 | 5.9 |
| Healthcare | 5 | 3.0 | 4.2 | .0 | 2.0 | 4.0 | 3.4 | .0 | 3.4 | 5.2 |

| Panel C: Mean, by disclosure theme | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | Question 2 | | | | | | | | |
| Company | N | Cus-tomers | Emp-loyees | Supp-liers | Gover-nment | Own-ers | Gen. Public | NGO | Unions | Q3 |
| Staff breakdown | 14 | 1.8 | 5.1 | .9 | 2.5 | 4.7 | 3.0 | 1.1 | 4.3 | 4.9 |
| Health, satisfaction | 14 | 1.1 | 5.8 | 1.0 | 3.2 | 4.4 | 3.4 | 1.2 | 5.0 | 5.7 |
| Education, training | 14 | 2.0 | 5.2 | 1.2 | 2.4 | 3.2 | 3.4 | 1.3 | 4.3 | 5.5 |
| Recruitment, etc. | 14 | 1.0 | 5.5 | .7 | 2.1 | 4.8 | 3.0 | 1.0 | 4.4 | 5.3 |
| Revenues, employees | 14 | 1.4 | 4.3 | .9 | 1.6 | 4.9 | 1.5 | .5 | 2.9 | 5.0 |

\* Stora Enso answered Question 3, but not Question 2. TeliaSonera did not answer any of the two questions.

\*\* Ericsson, Föreningssparbanken and Holmen did not answer Question 2 on a 1 – 7 scale, but as 'Yes' and 'No'. The 'Yes' answers have been classified as an average of answers by the other companies. Disclosure themes are further described in Table 1.

**Table X. Rank correlations, Questionnaire Questions 2 and 3, with Questionnaire Question 1 and Annual Report Data**

| Variable | N | Questio-nnaire Question 1 | Annual Report Data Words | Sentences | Quantitative Data | Monetary Data | Tables | Data Points |
|---|---|---|---|---|---|---|---|---|
| Question 2: Customers | 70 | .027 (.412) | -.033 (.392) | -.040 (.372) | .078 (.261) | .223* (.032) | .131 (.140) | .147 (.112) |
| Question 2: Employees | 70 | .571** (.000) | .177 (.072) | .148 (.111) | .138 (.127) | .131 (.141) | -.034 (.390) | .032 (.395) |
| Question 2: Suppliers | 70 | .278** (.010) | -.124 (.153) | -.163 (.088) | .046 (.353) | .313** (.004) | .081 (.253) | .153 (.102) |
| Question 2: Government | 70 | .103 (.199) | .197 (.051) | .160 (.092) | .143 (.118) | -.101 (.203) | .146 (.114) | .258* (.016) |
| Question 2: Owners | 70 | 204* (.046) | -.025 (.420) | -.025 (.418) | .158 (.095) | .040 (.371) | .020 (.435) | .000 (.500) |
| Question 2: Gen. Public | 70 | -.118 (.165) | .453** (.000) | .467** (.000) | .190 (.058) | -.091 (.228) | .175 (.074) | .210* (.041) |
| Question 2: NGO's | 70 | .122 (.158) | .169 (.081) | .163 (.089) | .051 (.336) | .124 (.154) | .029 (.406) | .150 (.108) |
| Question 2: Unions | 70 | .131 (.140) | .262* (.014) | .222* (.032) | .102 (.200) | -.089 (.233) | -.036 (.385) | .070 (.283) |
| Question 3 | 75 | .502** (.000) | .151 (.098) | .145 (.107) | .015 (.448) | .111 (.172) | .011 (.463) | .086 (.231) |

** Significant at 1 % level (one-tailed).
* Significant at 5 % level (one-tailed).
Tests were run excluding 'Yes'/'No' responses to Question 2 (15 observations), and only including those where respondents ranked importance on a 1 – 7 scale. Results were substantially the same.


**Table XI. Rank correlations Question 1, entire sample. Data is grouped by disclosure theme**

| Annual report variable | N | Spearman's rho |
|---|---|---|
| Number of words | 80 | -.005 (.483) |
| Number of sentences | 80 | -.002 (.493) |
| Quantitative data | 80 | -.017 (442) |
| Monetary data | 80 | .075 (.253) |
| Number of tables/diagrams | 80 | -.135 (.117) |
| Data points, tables/diagrams | 80 | -.042 (.356) |

** Significant at 1 % level (one-tailed).
* Significant at 5 % level (one-tailed).

# Appendix 1. Questionnaire

In our research project we are interested in to which extent your company actively works with a number of employee related activities (HRM). We are especially interested in explicit activities, specified e.g. in policies, strategies or plans. Your answers should therefore not reflect your personal opinions.

We ask you to answer the questions from a group perspective. The answers should consequently not only apply to the parent company, one division or other part of the group.

Questions 1 and 3 should be answered by putting an "X" in the corresponding box. The range goes from 1 – 7, where 7 represents "to a very large extent" and 1 "to a very limited extent".

If your company does not work with an item/theme, please indicate this by putting an "X" under "not applicable" (N/A).

| | N/A | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
|---|---|---|---|---|---|---|---|---|
| **1A Staff Breakdown** | | | | | | | | |
| **To what extent do you actively work:** | | | | | | | | |
| 1. with staff age structure (e.g. raising/lowering/keeping current average age)? | | | | | | | | |
| 2. with the group's organisational structure (e.g. to achieve a less hierarchical organisation, become process oriented)? | | | | | | | | |
| 3. with staff distribution by gender? | | | | | | | | |
| 4. with ethnical diversity? | | | | | | | | |
| 5. with number of employees per organisational entity (e.g. per subsidiary/division/business area? | | | | | | | | |
| 6. with employees' level of academic education? (e.g. number of employees with a university degree, high school diploma) | | | | | | | | |
| **1B Staff Health and Job Satisfaction** | | | | | | | | |
| **To what extent do you actively work:** | | | | | | | | |
| 7. with the group's staff turnover? | | | | | | | | |
| 8. with major changes in the number of employees (e.g. expansion or cut backs)? | | | | | | | | |
| 9. with staff health and safety? | | | | | | | | |
| 10. with the employees' total absence? | | | | | | | | |
| 11. with ongoing staff interviews? | | | | | | | | |
| 12. with a satisfactory work environment | | | | | | | | |
| **1C Education and Training** | | | | | | | | |
| **To what extent do you actively work:** | | | | | | | | |
| 13. with a policy regarding competence development programs? | | | | | | | | |
| 14. with key figures such as "training expenses/number of employees"? | | | | | | | | |
| 15. with key figures such as "employee expenses/number of employees"? | | | | | | | | |

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| **1D** | **Recruitment, Careers and Compensation** | | | | | | | | |
| | **To what extent do you actively work:** | | | | | | | | |
| 16. | with an explicit recruitment strategy? | | | | | | | | |
| 17. | on encouraging "job rotation"? | | | | | | | | |
| 18. | with career goals for employees? | | | | | | | | |
| 19. | with an explicit policy regarding salaries? | | | | | | | | |
| 20. | with employee incentives? | | | | | | | | |
| 21. | with an explicit policy regarding other employee benefits (e.g. health care, insurance programs) | | | | | | | | |
| **1E** | **Revenues and Employees** | | | | | | | | |
| | **To what extent do you actively work:** | | | | | | | | |
| 22. | on a strategy for developing key personnel? | | | | | | | | |
| 23. | with key figures such as "revenues/employee"? | | | | | | | | |
| 24. | with key figures such as "Value Added/employee"? | | | | | | | | |

| | | *Customers* | *Employees* | *Suppliers* | *Govern-ment* | *Owners* | *General Public* | *NGO's* | *Unions* | *Others (specify)* |
|---|---|---|---|---|---|---|---|---|---|---|
| **2.** | **Stakeholder issues** To what extent do you address the stakeholders to the right in your communication regarding the areas presented in questions 1-5. **Answer by writing a number between 1 and 7, where 7 represents "to a very large extent" and 1 "to a very limited extent" If you don't address one of the stakeholders at all, please write "N/A" in the box:** | | | | | | | | | |
| a) | **Staff Breakdown** | | | | | | | | | |
| b) | **Staff Health and Job Satisfaction** | | | | | | | | | |
| c) | **Education and Training** | | | | | | | | | |
| d) | **Recruitment, Careers and Compens.** | | | | | | | | | |
| e) | **Revenues and Employees** | | | | | | | | | |

| | | N/A | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
|---|---|---|---|---|---|---|---|---|---|
| **3.** | **Theme question** How important do you think the information in the five areas from question 1-5 is to the company's most important stakeholders? **Answer by writing an "X" in the applicable box:** | | | | | | | | |
| | **Staff Breakdown** | | | | | | | | |
| | **Staff Health and Job Satisfaction** | | | | | | | | |
| | **Education and Training** | | | | | | | | |
| | **Recruitment, Careers and Compensation** | | | | | | | | |
| | **Revenues and Employees** | | | | | | | | |

**Thank you for your participation!**