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Hiring practices in US third-party logistics firms

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Abstract *Reports the results of a survey of 41 US third-party logistics (3PL) firm practices for hiring entry-level managers. Reveals the recruiting, selection, and compensation methods used for 96 different positions and related compensation data (e.g. mean starting salary = US\$34,358). Recommends that 3PL firms use the information to benchmark current practices and offers specific ideas to improve recruiting effectiveness. Also proposes research results-driven job search strategies for individuals seeking positions with 3PL firms.*

Introduction

Faced with increasing global competition in the last two decades of the twentieth century, US manufacturers and merchandisers reexamined and reengineered their logistics systems to reduce cost and improve customer service (the Global Logistics Team, Michigan State University, 1995; Bowersox *et al.*, 1989). An increasingly popular reengineering strategy involves outsourcing one or more logistics activities/processes to third-party logistics (3PL) firms. 3PL firms (other than the buyer and seller – the first two parties in a market transaction) specialize in performing one or more logistics activities that could be performed by the buyer or seller (McGinnis *et al.*, 1995).

3PL firms may perform any logistics activity at any point in the supply chain. Logistics activities performed by 3PL firms include: transporting, warehousing, managing inventory, packaging, materials handling and managing logistics information (Stratton, 2001; Lieb and Peluso, 1999; Lieb and Randall, 1996a; McGinnis *et al.*, 1995; LaLonde and Maltz, 1992; Daugherty and Droge, 1991; Sheffi, 1990). Logistics activities most frequently outsourced by manufacturers and merchandisers include outbound and inbound transportation, freight bill auditing/payment and warehousing (Lieb and Peluso, 1999).

As a result of these practices, the demand for 3PL services is growing and should continue to grow significantly. According to estimates by Robert V. Delaney of Cass Information Services, Inc., the US market for 3PL services was \$25 billion by 1997. The market size reached \$56.4 billion by 2001, a 22.5 percent annual growth rate from 1997 to 2001. At \$56.4 billion, the 3PL services market would represent an 11 percent market penetration rate for logistics services required by manufacturers and merchandisers (Cooke, 2001; Wilson and Delaney, 2001; Delaney, 1998).

Given the high rate of growth, a critical aspect of providing effective and efficient 3PL services involves the successful acquisition of managerial human resources. In three consecutive annual surveys of CEO perceptions, CEOs identified “company employees/expertise” as the most important factor that distinguishes their companies from the competition. However, these same CEOs identified the most significant problem faced by 3PL firms as “finding qualified people” (Lieb and Randall, 1996b).

A number of factors may contribute to the shortage of qualified managerial talent in firms providing logistics services. First, the overall demand for entry level and experienced logistics managers continues to grow (Daugherty *et al.*, 2000; Lieb and Peluso, 1999; LaLonde and Pohlen, 1999; LaLonde and Masters, 1998). As a result, there is significant competition for quality logistics management talent among 3PL service providers, manufacturers, merchandisers and government organizations (Metz, 2000).

Second, large 3PL firms have primarily focused their sales efforts on large corporations that have sales revenues in excess of \$500 million (Lieb and Peluso, 1999). Consequently, when one of these firms generates a new sale (adds a customer), the increase in business may be large and require significant additions to management resources.

Third, 3PL relationships with customers are increasingly contractual rather than transactional, with typical contract lengths of one to three years (Lieb and Randall, 1996b). Given the contractual nature of sales, 3PL providers are likely to wait until a contract is signed before seeking the human resources required to provide the specialized services spelled out in the contract. As a result of this practice, 3PL firms may face interim shortages of quality employees.

To deliver quality services in this turbulent, competitive, growing market, it is essential for 3PL firms to develop an effective human resource program to ensure successful acquisition of qualified managers. This article provides a benchmark for managers who seek to develop or improve human resource programs by reporting the results of a survey of current US 3PL hiring policies and practices regarding entry-level managers.

The article also provides valuable information to a variety of individuals: students who are investigating career opportunities in logistics, logistics educators and placement personnel who provide career planning assistance, and current candidates for positions with 3PL firms. Each group could benefit from the article’s insights regarding recruitment methods, key skills and qualifications and compensation.

Methodology

The research consisted of three key activities:

- (1) critical human resource management policy and procedural issues and variables were identified by conducting a literature review and focus group interviews;

- (2) data were collected regarding 3PL entry-level management recruitment, selection and compensation practices by developing and mailing a survey; and
- (3) survey data were analyzed using various techniques.

These activities will be more fully discussed in the paragraphs that follow.

A review of the human resource management and logistics literature was used to identify important human resource policy and procedural issues. The human resource management literature revealed a number of general policies and procedures pertaining to employee recruitment, selection and compensation. The logistics literature provided information regarding skill sets that employers desire in prospective entry-level managers (LeMay and Carr, 1999; Noe *et al.*, 1998; Ivancevich, 1998; CLM staff, 1998; Trunick, 1998; Melbin, 1996; LaLonde and Powers, 1993). As a result of the literature review, the three general research areas and questions were identified as:

- (1) *Recruitment practices:*
 - what methods are used to recruit entry-level managers?;
 - how is the budget allocated among the recruitment methods used?;
 - how successful are the recruitment methods employed?
- (2) *Selection practices:*
 - what selection criteria are used for entry-level management positions?;
 - what management skills are sought for entry-level management positions?;
 - what knowledge areas are sought for entry-level management positions?
- (3) *Compensation practices:*
 - what compensation methods are used for entry-level management positions?;
 - what is the level of compensation for entry-level management positions?

In addition to the literature review, a series of in-depth personal interviews were conducted with 3PL CEOs, human resource executives and senior-level operating managers to specify types of policies and practices further in each of the general research areas. The information was used to design the survey instrument.

A detailed ten-page mail questionnaire was developed to investigate a wide variety of human resource issues, including the research areas and questions identified above. The first draft of the questionnaire was pre-tested using a small sample of senior-level 3PL executives, each representing a different company. These executives were encouraged to critique the survey instrument

and offer suggestions that would improve the clarity and managerial relevance of all survey questions. The feedback from these executives enabled the researchers to improve the survey instrument and tailor the questions to the 3PL industry.

The 100 largest US 3PL firms (based on revenue) were identified using *Who's Who in Logistics?* *Armstrong's Guide to Third Party Logistics Service Providers* (Armstrong, 1998), *Inbound Logistics* (Stratton, 1998) and the *T&D Contract Logistics Database* (Richardson, 1996). Firm revenues were verified by using a number of secondary financial sources. Each of the 100 firms was contacted by telephone to identify a senior human resource manager and verify the mailing address. One questionnaire was mailed to each firm. The initial mailing resulted in 19 usable responses. A follow-up telephone call and mailing to non-respondents resulted in an additional 22 usable responses. Of the 100 questionnaires mailed, none was undeliverable because of wrong or changed addresses. The effective sample size, then, was 100.

A total of 41 completed surveys were returned. The response rate of 41 percent (41/100) was excellent given the extended length of the questionnaire and the time sensitivity of the potential respondents. A total of 60 percent of the 40 largest third-party firms in the logistics industry responded. These respondents account for 67 percent of the total revenue and 64 percent of the total employees of the 40 largest 3PL firms.

Since 3PL firms hire entry-level managers for numerous different positions, the researchers requested recruitment, selection and compensation information regarding the firm's three most frequently filled entry-level management positions. The 41 respondents provided data pertaining to 103 positions. However, seven of these positions required significant experience – 5.6 years versus 1.5 years for all other positions. Thus, the survey responses related to these experienced management positions were omitted because they were not entry-level in nature. All analysis for this article is based on the 96 entry-level positions provided by the 41 respondents.

Non-respondents were contacted by telephone to determine the reasons for non-response. Two reasons for non-response were identified. First, the ten-page survey instrument appeared to be a time-consuming task and senior executives are time sensitive. Second, in some firms, a number of individuals would have had to provide data in order to complete the questionnaire. In such cases, the questionnaire was routed through a number of individuals and “lost”, “filed”, or “placed in an infinite queue”.

Early and late responses (i.e. the 19 responses from the initial mailing versus the 22 responses from the phone calls and second mailing) were compared to test for non-response bias (Armstrong and Overton, 1977). The comparison of these two groups' mean responses to survey questions revealed no significant differences, suggesting that non-response bias is unlikely to be an issue in interpreting the results of the study.

The completed surveys were coded, entered into a personal computer and analyzed using Microsoft Excel 2000 and SPSS Release 10.0 for Windows. The

survey responses were both qualitative and quantitative. Therefore, a wide variety of analytical techniques were used to interpret the data. Responses containing nominal data were analyzed using simple frequency counts and percentages, cross tabulation and Pearson Chi-square tests. Responses containing ratio data were analyzed using means, standard deviations, *T*-tests, correlation analysis and analysis of variance (ANOVA) with *post hoc* pairwise multiple comparisons (Tukey HSD). All statistical tests were conducted at a 95 percent confidence interval (p -value < 0.05).

Research results

The survey responses were analyzed collectively and then categorized by two demographic variables for further analysis. The 41 respondent firms were grouped by primary service offering listed in the previously mentioned resources (Armstrong, 1998; Stratton, 1998; Richardson, 1996). Four “firm types” were identified among the responses:

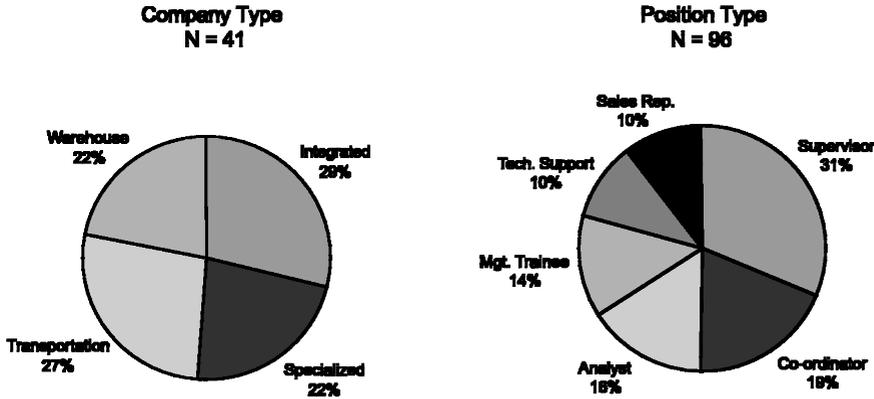
- (1) *Integrated logistics service provider*. Provides logistics services related to multiple logistics functions (e.g. transportation services plus warehousing services).
- (2) *Transportation service provider*. Provides transportation services (e.g. carrier selection, shipment consolidation, fleet management, shipment tracking).
- (3) *Warehouse service provider*. Provides warehousing services (e.g. warehouse management, order fulfillment, repackaging).
- (4) *Specialized service provider* – (e.g. freight forwarding, customs support, information, financial or environmental services).

The 96 entry-level positions were coded and grouped according to the title and job description provided by the respondents for each position. Six “position types” emerged from the classification process:

- (1) *Logistics analyst*. Provides logistics decision support for strategic planning, tactical planning, and operational performance and control.
- (2) *Logistics coordinator*. Coordinates one aspect of logistics operations such as customer service or transportation.
- (3) *Management trainee*. Participates in an entry-level training program, rotated through different positions.
- (4) *Operations supervisor*. Supervises hourly operations personnel, project activities and/or logistics functions.
- (5) *Sales representative*. Sells 3PL services to customers.
- (6) *Technical support*. Provides technical support to information technology, industrial engineering and other functions.

A breakdown of the survey responses by these two demographic categories is provided in Figure 1.

Figure 1.
Respondent demographics



Recruitment practices

The initial survey questions focused on entry-level manager recruitment policies and practices. Issues of primary interest included recruitment methods used, dispersion of budgets among the methods and success rates of each method. Key findings are provided below.

Respondents were asked about their firms' use of eight commonly employed recruitment tools. Most respondents use a variety of methods (mean = 5.0) to recruit entry-level managers. Only 10 percent of the respondents rely on a single method. Figure 2 reveals that two external recruiting methods – media advertising and college recruiting – are the most widely used. Two internal

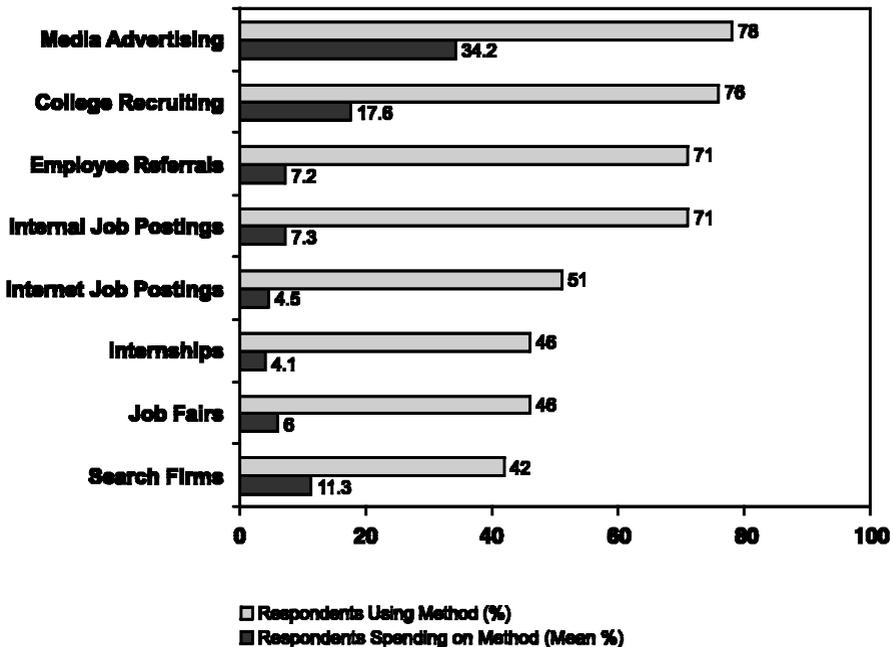


Figure 2.
Recruiting methods and
spending

methods – employee referrals and internal job postings – are also employed by a majority of organizations. Internet job posting, a relatively new recruiting tool, is quickly gaining acceptance. Just over half of the respondent firms publicize their entry-level positions on-line.

Spending on these recruiting methods varies widely. Figure 2 highlights the heavy allocation of recruitment budgets to media advertising, nearly double the amount dedicated to college recruiting. The respondents' spending on management search firms is another noteworthy finding. Although this recruiting method is used by the smallest percentage of respondents, spending on search firms ranks third overall. This outsourcing of the entry-level management recruiting activity is somewhat surprising, given the cost involved and the fact that, traditionally, search firms have been used to recruit more experienced managers and executives.

The final question regarding recruitment practices focused on the respondents' success in filling entry-level manager positions by the eight recruiting methods. Media advertising was the most successful method. College recruiting ranked second in recruiting success rates among the respondents. Nearly 70 percent of the respondents experienced success with this method. Table I shows that the respondents had success rates in excess of 50 percent for every method used.

Further analysis of the recruiting methods by position type revealed that the respondents succeed in filling openings with just a few methods per position type. In five of six positions, the top three recruiting methods account for the majority of the openings successfully filled. The lone exception is the sales representative position, where the top three methods fill less than half of the respondents' positions. Table II identifies the top method for each position type.

Overall, media advertising and college recruiting stand out from the other six recruiting methods. The respondents use these two methods to the greatest extent, devote large proportions of recruiting budgets to them, and achieve the highest success rates using them. The other methods serve largely as

Recruiting method	Recruiting success rate ^a
Media advertising	84.7
College recruiting	68.8
Employee referrals	63.6
Job fair and events	63.0
Internal job postings	61.8
Internet job postings	60.4
Search firms and agencies	57.8
Interns and co-op	52.1

Note: ^a Recruiting success rate =

$\frac{\text{No. of organizations successfully hiring candidates via recruiting method}}{\text{No. of organizations attempting to hire candidates via recruiting method}}$

Table I.
Recruiting results
attained

supplementary recruiting tools for identifying entry-level management candidates.

Selection practices

The participants were asked a series of questions regarding entry-level manager selection practices. They provided specific responses for individual positions. The questions focused on key qualifications and selection criteria, general management skills and logistics-related knowledge. Noteworthy findings are provided below.

The analysis revealed that an overwhelming majority of the respondents expect new hires to have a formal college education. Given the types of positions and respondent firms, it is not surprising that the most commonly required degree program (i.e. major) is logistics. Figure 3 provides full details regarding degree and major requirements for the 96 positions studied.

Minimum grade point average (GPA) requirements were specified for 58 percent of the positions. Acceptable GPAs for these positions ranged from 2.5 to 3.5 on a 4.0 scale. The mean GPA across all positions was 2.87. ANOVA

Position type	Top recruiting method	Percentage of positions filled via this method
Management trainee	College recruiting	60.7
Logistics coordinator	Media advertising	49.7
Operations supervisor	Media advertising	45.7
Logistics analyst	Media advertising	32.2
Technical support	Search firms and agencies	25.0
Sales representative	College recruiting	17.7

Table II.
Recruiting methods
used

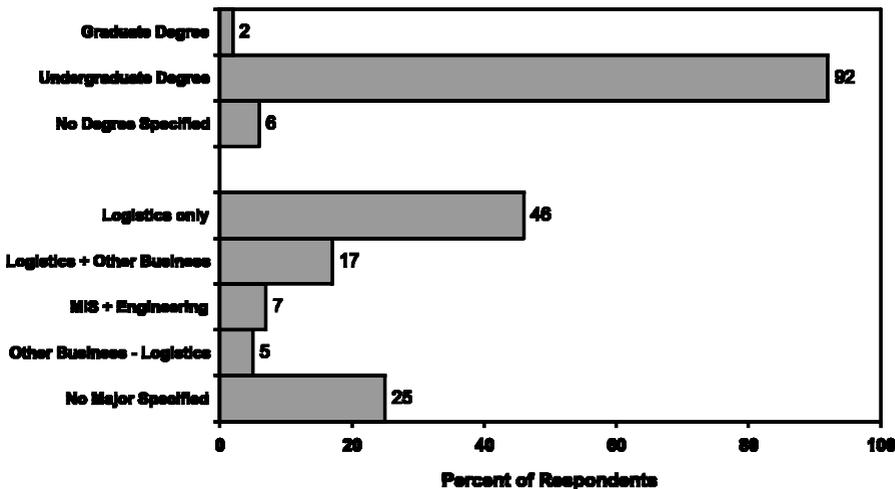


Figure 3.
Education requirements
– preferred degree and
major

tests of GPA average by position type (p -value = 0.018) revealed that management trainee and technical support positions had significantly higher GPA requirements than did sales representative positions (3.15 and 3.14 versus 2.75). No other significant differences existed by position type or firm type.

Previous experience is another key selection criteria. Overall, 85 percent of the positions studied require some form of previous experience. Internships and traditional work experience are each accepted for 30 percent of the positions, while either is acceptable for the other 25 percent. The desired level of experience ranged from one half to five years (mean = 2.7 years). Chi-square tests revealed no significant experience requirement differences by position type or company type.

Next, the participants were asked to rate the importance of 17 management skills to their entry-level management positions. The participants used a five-point scale (5 = very important to 1 = not important) to evaluate each skill. The overall mean response and standard deviation for each skill is provided in Table III, as well as noteworthy results from ANOVA tests by position type and firm type.

Although the mean score for every skill was above neutral (i.e. above 3), it is important to note the highest rated skills are dominated by general management skills and interpersonal capabilities (e.g. problem solving, oral communication, ability to plan and organize). Technical skills and specific capabilities (e.g. financial analysis, quality analysis, negotiation) were the lowest rated skills. Overall, it appears that the respondents are most interested in entry-level management candidates with strong problem solving, planning and decision-making skills plus people skills.

ANOVA tests for differences in importance ratings by position type revealed that some skills are critical in certain positions. Interpersonal skills are significantly more important in those positions with high levels of customer and/or employee interaction (e.g. sales representatives, operations supervisors and logistics coordinators) than in positions of a more task-oriented nature (e.g. logistics analysts and technical support personnel). Conversely, financial analysis skills are significantly more important to these analyst and technical support positions than to the logistics coordinator position. Table II provides additional details regarding these differences.

Similar ANOVA tests by firm type uncovered five skills with significantly different mean ratings. Transportation firms placed greater emphasis on:

- (1) ability to plan and organize;
- (2) ability to think creatively;
- (3) ability to learn quickly;
- (4) negotiation skills; and
- (5) financial analysis

than the other firm types. Many of these skills are necessary for managing dynamic day-to-day transportation operations (e.g. routing, scheduling, load

Management skill	Mean rating	Standard deviation	Significant differences revealed by ANOVA tests		<i>p</i> -value
			More important to ...	Less important to ...	
Problem solving	4.68	0.64			
Oral communication	4.51	0.67			
Ability to plan/organize	4.46	0.64	Transportation firms	Specialized service firms	0.007
Ability to learn quickly	4.42	0.66	Transportation firms	Integrated service firms	0.000
				Specialized service firms	
Decision making	4.40	0.76	Operations supervisor position	Technical support position	0.008
			Logistics coordinator position		
Ability to work on team	4.39	0.82	Sales representative position	Logistics analyst position	0.039
Ability to manage relationships	4.38	0.78	Sales representative position	Logistics analyst positions	0.000
			Operations supervisor position		
Ability to think creatively	4.27	0.81	Transportation firms	Specialized service firms	0.026
Written communication	4.09	0.80			
Logistics analysis	4.00	1.11			
Leadership	3.96	0.93			
Project management	3.90	0.90			
Spreadsheet/database	3.91	0.91			
Word processing	3.77	0.90			
Negotiation	3.55	1.11			
			Sales representative position	Technical support position	0.029
Quality analysis	3.21	1.13		Logistics analyst position	
Financial analysis	3.03	1.03	Transportation firms	Integrated service firms	0.004
			Technical support position	Logistics coordinator position	0.003
			Logistics analyst position		
			Transportation firms	Warehousing firms	0.015

Note: Rating scale: 5 = very important to 1 = not important

Table III.
Management skills
desired for entry-level
logistics manager
positions

planning and driver management) and interacting with customers. Full details of the differences are provided in Table III.

The final question regarding selection practices focused on the importance of nine specific logistics knowledge areas to each position. The participants rated the knowledge areas using a five-point scale (5 = very important to 1 = not important). The overall mean response and standard deviation for each knowledge area is provided in Table IV. This table also provides noteworthy results from ANOVA tests by position type and firm type.

The importance ratings for the knowledge areas were not high, especially when compared to the management skills previously discussed. Only one area – customer service – was rated as important. Six others had mean ratings in the neutral range and one was rated relatively unimportant. These results may indicate that companies expect new hires to have some general knowledge of logistics when they start the job, but also expect new hires to gain more specialized logistics knowledge and learn the firm's practices via training and on-the-job experience.

ANOVA tests revealed few major differences in importance ratings. On a position type basis, customer service knowledge was significantly less important for technical support personnel than it was for logistics coordinators, sales representatives and management trainees. These positions require greater knowledge of customer service issues and concepts because managers in these positions may interact frequently with customers. For example, many logistics coordinators are primarily responsible for customer service coordination. In addition, many management trainees are given initial assignments related to customer service in order to familiarize them with customer service requirements.

From a firm type standpoint, ANOVA tests revealed significant importance rating differences for four knowledge areas. Given their primary activities, it was no surprise that warehousing firms rated inventory management, warehouse management and materials handling significantly higher than specialized service firms or transportation firms. Integrated service firms also rated warehouse management knowledge higher than these two firm types. Finally, specialized service firms rated import/export knowledge significantly higher than integrated service firms.

In general, the respondents seek well-rounded individuals possessing college degrees, logistics training and a GPA in the "B" to "B–" range for entry-level management positions. Previous work experience is another key requirement. Finally, most of the positions require individuals to possess interpersonal skills and general management skills rather than specific technical or logistical skills.

Compensation practices

The final topic of interest was compensation practices. The respondents were asked to provide information regarding the starting pay and bonus structures for their entry-level management positions. The key findings are provided below.

Knowledge area	Mean rating	Standard deviation	Significant differences revealed by ANOVA tests		<i>p</i> -value
			More important to ...	Less important to ...	
Customer service	4.18	0.97	Logistics coordinator position Sales representative position Management trainee position	Technical support position	0.021
Traffic/transportation management	3.78	1.08			
Order management	3.26	1.20			
Inventory management	3.22	1.40	Warehousing firms	Specialized service firms Transportation firms	0.006
Warehouse management	3.19	1.29	Warehousing firms Integrated service firms Warehousing firms	Specialized service firms Transportation firms	0.000
Material handling	2.90	1.29	Specialized service firms	Specialized service firms Integrated service firms	0.009
Import/export	2.86	1.39			
Production	2.83	1.24			
Purchasing	2.31	1.19	Specialized service firms	Integrated service firms	0.042

Note: Rating scale: 5 = very important to 1 = not important

Table IV.
Knowledge desired for
entry-level logistics
manager positions

The analysis revealed that nearly all of the entry-level positions studied are salaried positions. Figure 4 reveals that over 90 percent of the positions are salary based, while only 2 percent are hourly pay based. The most commonly used pay methods are salaries with either a six- or 12-month review.

Figure 4 also highlights the opportunity for bonuses and other major perks in the entry-level positions studied. Nearly 80 percent of the entry-level management positions offer one or more compensation enhancing benefits. The most common bonus opportunities are based on individual, company or team performance.

Chi-square analysis of the use of primary pay and bonus methods revealed no significant differences by position type. However, significant differences in usage levels were found for both compensation methods by firm type. Table V reveals that specialized service firms, integrated service firms and warehouse firms rely on specific pay methods to significantly greater than expected levels. Integrated service firms and warehouse firms use specific bonus methods to significantly greater than expected levels.

The participants were also asked to estimate the annual compensation (in US\$) for each entry-level position. The average starting pay across all positions for all compensation types was \$34,358 per year. The average bonus across four cash payment methods was \$2,982 during the first year.

As Table VI reveals, the highest average pay level exists in positions providing a salary with a 12-month review. While the other positions had slightly lower average starting pay levels, they offered opportunities for pay increases during the first year via expedited reviews, commissions or

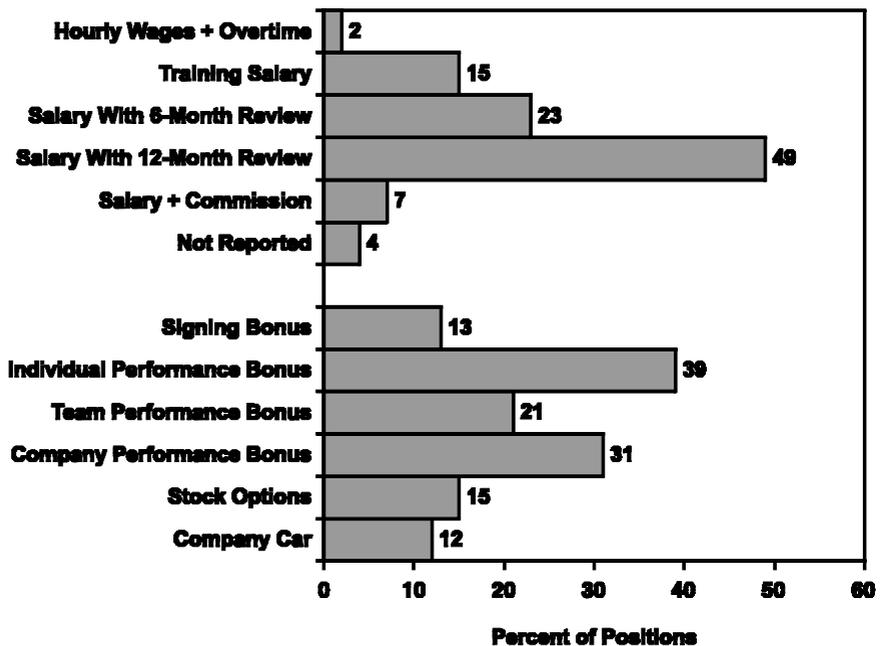


Figure 4.
Compensation methods
used

Method	Significant differences in usage levels revealed by chi-square tests		<i>p</i> -value
	Significantly higher than expected use by ...	Significantly lower than expected use by ...	
Regular salary with six-month review	Specialized services firms	Integrated services firms Warehousing firms	0.001
Regular salary with 12-month review	Integrated services firms Warehousing firms	Specialized services firms	0.000
Company-based performance bonus	Warehouse firms	Integrated service firms	0.000
Team-based performance bonus	Integrated service firms	Warehouse firms	0.039

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Table V.
Analysis of primary compensation and bonus methods

Method	Mean (\$)	Standard deviation (\$)	Range (\$)
Salary with 12-month review	34,907	7,049	24,000-57,000
Salary with six-month review	33,933	5,134	27,000-45,000
Salary plus commission	33,600	6,504	30,000-45,000
Training salary	29,409	3,247	26,000-36,500
Individual performance bonus	3,296	1,966	1,000-10,000
Company performance bonus	2,079	1,823	500-6,500
Team performance bonus	1,475	234	1,000-1,919
Signing bonus	1,450	599	1,000-2,500

Table VI.
Entry-level management compensation levels

completion of a training program. Individual performance based bonuses led all other categories of bonuses. Wide compensation ranges exist within each pay and bonus method.

ANOVA tests were used to investigate annual pay and bonuses. Table VII reveals that entry-level managers in technical support positions receive significantly higher starting average annual pay (\$45,394) than all other positions. The other positions range from \$30,000 to \$35,786, though the differences are not statistically significant. Also, there were no significant differences in annual pay by firm type. Finally, no statistical differences were found for average bonus dollars paid by position type or firm type.

Overall, the respondents offer starting salaries for entry-level management positions in the mid-\$30,000 range. Technical support positions command the highest starting salaries. New hires typically receive reviews and opportunities for pay increases after six or 12 months on the job. Cash bonuses based on performance are widely offered for these positions. The average year-end bonus is nearly \$3,000 for the positions studied. Other perks (stock options, car allowances, etc.) are provided on an infrequent basis to individuals in these entry-level management positions.

Table VII.
Analysis of
compensation levels

Position type	Mean pay (\$)	Standard deviation (\$)	ANOVA results (<i>p</i> value = 0.000)
Technical support	45,394	8,155	Mean pay is significantly higher than all other position types
Logistics analyst	35,786	5,646	
Sales representative	33,322	6,292	
Management trainee	33,250	4,153	
Operations supervisor	33,105	4,965	
Logistics coordinator	30,000	4,084	

Research implications

The results of this study provide key insights for two primary groups – 3PL logistics firms who are the “buyers” of entry-level management talent and job candidates who are the “sellers” of their employment services. The candidate-focused recommendations should also be of value to students interested in 3PL careers and other key individuals – logistics faculty who advise students on career issues, college placement personnel who help prepare students for interviews and management recruiters who facilitate the hiring process.

Recommendations for 3PL firms

The increasing interest in logistics and supply chain management among manufacturers, retailers, e-commerce companies and others has created a talent shortage. Currently, the demand for qualified entry-level candidates exceeds the supply (Biederman, 2001). To succeed in this highly competitive employment market, US 3PL firms must vigorously recruit qualified entry-level management talent. Based on the research findings, opportunities exist for 3PL firms to enhance their hiring practices. They should focus on the following issues when establishing/re-evaluating hiring practices and conducting searches:

- *Use recruiting approaches that reach a wider pool of candidates in this tight labor market.* The study participants rely heavily on media advertising. While successful, this method typically reaches only a limited geographic group of candidates who actively search the “classified advertisements”. To attract the interest of a broader range of qualified candidates (over 90 percent of the positions require a college degree), 3PL firms should expand on-campus recruiting efforts at universities with logistics programs, increase the use of Internet job postings, and use targeted media advertising in university markets.
- *Employ recruitment methods that are more efficient than management search firms.* The participants spent the third highest proportion of their

recruiting budgets on this method although it had one of the lowest recruiting success rates. College placement offices provide similar services and access to candidates at no cost to the firm. Also, professional associations often provide resume matching services and job banks at nominal cost.

- *Increase internship opportunities in 3PL firms.* More than half of the positions studied require internship experience but the respondents spend only four percent of their recruiting budget on this method. Internships are an effective way to promote 3PL career opportunities, attract quality candidates, provide valuable experience and assess an individual's capabilities before extending a full-time offer.
- *Benchmark entry-level compensation levels against other organizations that hire entry-level logistics managers and adjust accordingly.* The average starting salary of \$34,358 for the 3PL positions studied is approximately \$5,000 lower than salaries for entry-level logistics management positions in general (Biederman, 2001; Farris, 2000). In order to attract and compete for top candidates, 3PL firms may find it necessary to raise starting salaries, shorten performance review cycles and/or increase bonus opportunities.
- *Provide salary differentials to more qualified candidates.* The analysis revealed that mean starting salaries of the positions studied are statistically similar, regardless of required work experience, internship experience or GPA. 3PL firms with the highest expectations in these areas may need to increase starting salaries in order to attract qualified candidates. Otherwise, experienced and/or high GPA graduates will seek opportunities with other employers that "recognize" past achievements and qualifications via higher starting salaries.

Recommendations for job candidates

The "hot" job market in logistics may lull some potential entry-level management candidates into thinking that 3PL companies will beat a path to their doorstep with lucrative offers. In reality, an active, well-planned and executed effort is required to identify opportunities and prepare effectively for them. Individuals seeking entry-level management positions with 3PL firms should take note of the recruiting practices identified in this study and tailor a job search strategy around them. Key recommendations include:

- *Recognize that 3PL firms do not use every method available to recruit entry-level managers.* For example, the study indicates that not every 3PL firm recruits on campus or posts positions on the Internet. Candidates must seek out employers and make themselves available through multiple channels to connect with a wide array of 3PL firms.

- *Build skills that are appealing to potential 3PL employers.* The study revealed that some skills are universally desired (e.g. problem solving and oral communication). Other skills are more important to transportation firms and/or specific positions (e.g. negotiation and decision making). Candidates should attain the appropriate skills for their desired positions via classes, work experience or other means.
- *Develop reasonable expectations of “what the market will bear” in terms of 3PL compensation.* The study indicates that a wide array of starting salaries is paid to entry-level 3PL managers (mean = \$34,358 with a standard deviation of \$6,723). Candidates should be prepared to negotiate a realistic salary with potential employers.
- *Evaluate the total compensation package and growth opportunities when assessing 3PL offers.* The study results show that 3PL firms offer a variety of pay types, bonus opportunities, performance review frequencies and other perks. Rather than focusing exclusively on the starting salary, candidates should factor in all compensation components when comparing offers to expectations and/or other opportunities.

Summary and future directions

Recruiting and selecting high quality management talent is an important activity for 3PL firms. The growth of logistics outsourcing, the level of competition within the 3PL industry and the high demand for qualified logistics talent each impact the hiring process and create a challenging recruiting environment.

This study provides insight into 41 large US 3PL firms' practices for recruiting, selecting and compensating individuals in 96 different entry-level management positions. Analysis of the survey responses revealed many similar practices across organizations and some noteworthy differences by firm type and position type.

Organizations both inside and outside of the 3PL industry can use the study findings and recommendations to benchmark their hiring practices and identify opportunities to enhance their potential for recruiting success. Candidates can use the information to develop job search strategies and compensation expectations.

This study focused on 3PL firm practices regarding the acquisition of entry-level managers. A companion study that focuses on 3PL firm practices regarding the development and retention of entry-level managers could be undertaken. Also, empirical research could benchmark 3PL firm practices regarding acquisition, development and retention of logistics managers at mid and upper levels of management. In addition, the human resource practices of US 3PL firms could be compared to those in other geographic regions.

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