

## **A critical review of literature on-the-job training's incidence and its effects in Company**

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### **Abstract**

This theoretical article aims to collect and review critically some empirical findings and researches on the incidence of employer training and the economic effects of it on company. It's aimed to clarify the type of training that companies ensure on the work place, the frequency of training. Is it true that after training, employees have higher chances of promotion and mobility? What are the benefits from the point of view of the companies for them? Is it measurable this investment in human capital?

Knowing correctly the literature related to the questions above, it helps the policymakers to formulate the right policies for equality of earnings and accessing on-the-job training, decrease chances for gender discrimination and increase the long run return of the company that makes training among employees.

There is a higher interest studying the incidence, determinants, and effects of company training, supported by more reliable data and sophisticated research techniques and instruments. On the other hand, as the interest for the topic increases, so the confusion surrounding this literature does. There are a few empirical articles for the case of Albania. Identifying the right literature and developments on the topic should help the other researchers to explore the field and to contribute with updated findings for Albania's work market.

**Keywords:** incidence of training, on-the-job-training, literature review, labor market, costs of training

### **Introduction**

It's stated in literature that company provider of training benefits from this process in long run while employees profit during work process and after, in a long run, increasing the probability for promotion and career development. The paper is concentrated in questions such as: What type of training is more frequent on the job place? What are the reasons behind the training offered by companies? What about society and economy: is it changing the structure of labor market? What about the productivity and competitiveness of company that offer training? Is there a significant measurable difference?

The article is concentrated on the most updated empirical researches on the topic, so it's understandable that methodological elements and theoretical models are briefly mentioned. Also the literature about apprenticeship training is excluded and the topic about training employees with only low-level skills, is studied by Nestler and Kailis (2002) and elaborated in the OECD Reports (1994, 1999, 2003).

Theoretically the main concern for a company in the decision making about training is buying new skills (means hiring properly skilled employees or investing in the existing staff by training them with the new skills required by the labor market. If the decision is pro the training of the present staff, then another decision is: Which employees are to be trained (if the process is selective or open to all), what type of training is the company looking for? Is it about specific training (more costly) or about general training (facing also the risk that the employees will be taken by the competitors after the training)? All these questions have been answered in literature and reformulated during years, from one author to another.

Even of a vast literature on the topic, less is known about the factors of the duration of the training (the intensity of training). Also it is logical to think about the effects of the training after the training investment on human capital has been made. The discussion will proceed with the review of a few researches on the impact of training on the company's (training-provider) performance, effectiveness and competitiveness and at the end of the discussion on the society welfare and the productivity of labor market. It's interesting to underline that existing researches are limited in USA, Europe (especially in UK).

About the labor market in Albania, there is a poor literature concerning the training process provided by companies (as e developing country with specific economic characteristics).

### **Type of on-the-job training**

There is a traditional division of company's training: general and specific.<sup>1</sup> It's a topic taken often in consideration recently. The first ones are Becker (1964) and Mincer (1974) who clarify the differences between two types of training. Hashimoto (1961) stated that during general training, employees should pay in contrast with the situation during specific training when costs and profits are shared between company and employees (the risk of capital losses due to quits are minimized).

A considerable number of studies contrast this traditional view. Loewenstein and Spletzer (1998, 1999) in a study conducted in USA concluded that employees pay also for the general training. Even Booth and Bryan (2002) in a survey conducted in Europe found that European employers are more likely to pay for training that generates new general skills. An interesting conclusion is by Lazear (2003): there is no specific training; all skills are used by other companies as well.

Acemoglu and Pischke (1998) formulate the assumption that the company in itself has larger information about the skills of employees; they built a multiple equilibrium based on the employees quitting rate.

Booth and Zoega (2000) built a model that found support from other researches in the USA. On the base of their model was the company ability to increase productivity of employees in synchronisation with colleagues, in order that the company could save the position in the labor market. In this context was also the work of Autor (2001). He offered a model (confirmed with data) that proved that it's general training instead

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<sup>1</sup> General training is transferable to other companies. Specific training, increases the skills of the trained employee only and isn't transferable.

of specific one that creates incentives between employees to be part of the training (employees with more unobserved skills are more attracted).

Gersbach and Schmutzler (2003) work was related to imperfect product market competition, a form of market where firms are more likely to provide general training. Acemoglu and Pischke (1999a, 1999b) have provided another argument: The wages and productivity relation give incentives for the company to pay also for the general type of training.

Bassanini and Brunello (2003) suggested that there is a significant negative correlation between training incidences and training wage premiums, so the higher wage compression, the higher the probability that employers pay for the general training. In summarizing, many recent empirical works support the idea that imperfections of labor market that inevitably limit worker's mobility, increase the company's willingness to pay for more general skills on-the-job training. In this context, European firms seem to take the general training costs more seriously than USA firms.

### **Training effects on company**

According to the human capital theory (Becker 1964), there is a negative correlation between the turnover and the specific training. In the middle of this conclusion is the tendency to maintain a long-term employment relationship (both the employer and employee).

Another theory developed by Doeringer and Piore (1985) (the so-called internal labor market theory) emphasizes the motivation of the company to discourage turnover among firm's employees through structuring the internal labor market; this in order to highlight the commitment to the existing workplace.

According to Frazis, Gittleman and Joyce (2000) the relationship between training and turnover is ambiguous. The company affronts the risk of employees that leaves after specific training. According to their work, this relationship is negative. Later, Francesconi and Zoega (2003), proved that a male employee in a full-time job, who is part of employees' union has lower willingness to leave that a colleague with the same attributes but non part of the employees' union. This increases the rate of general training of company.

In a UK study on this topic (Dearden et al., 1997) study an interesting aspect of this topic: the linkage between training and the work rotation. Job mobility seems to not affect the incidence of training, both on men and women employees. In addition Green et al. (2000) conducted a study in UK and found that: the higher the rate of specific training, the lower the employees' mobility; also the training had no effect on mobility.

### **Company training effects on wage**

There is an important difference between two types of training: during general training companies don't cover any cost, is the employee that finances the process by accepting a lower wage during the training period, and then on a long run period collect back the returns through a higher wage as compensation of the gained skills.

The situation isn't the same during the specific training or when the labor market has frictions that give to the firms the possibility to share the costs of the training. The returns will increase the productivity more than the wage growth rate.

The major part of the studies, have the same empirical conclusion: there is a significant positive impact on the wage due to the training. As stated by Lynch (1995:57): "Training for training's sake will not eliminate the wage gap."

In recent years, this conclusion has been questioned because training isn't distributed among employees in random way. There are evidences from France by Goux and Maurin (2000) that state that there is a non significant wage effect from the training. Later Both and Bryan (2002), brought evidences from UK for the same topic. They found that if it's controlled the heterogeneity from time, it could be predicted the premium wage from company training (a positive and persistent in time premium). There are also evidences from Norway that the estimated wage effect is around 1% (Schøne 2004). With another technique suggested by Leuven and Oosterbeek (2002), the predicted wage return in firms that provided formal training was around zero, in the Netherlands.

### **Company training effects on productivity**

This effect of company's training, in literature is measured indirectly, by its effect on wages. According to the traditional neoclassical labor market, wages measure productivity.

In this context is a study conducted by Dearden, Reed and Van Reenen (2000), that covered a period from 1983 up to 1996, using a panel data from British industries, and the main finding was: productivity is affected significantly by the training.

There is a vast literature about this relationship due to two reasons: (1) companies do training due to the low productivity, so the training is an endogenous factor; (2) the effects of training on the wages are lower of those of industrial productivity.

The effects of employer-provided training on company productivity have typically been evaluated indirectly by means of its impact on wages. A major shortcoming of such an approach, however, is that wages are suitable as a direct measure of productivity only in a traditional neoclassical labor market; that is, in a labor market with perfectly competitive wages. As noted in the previous section, in situations where both the costs and the benefits of the training investment are shared by the employee and the employer, the result is an underestimation of the wage effect in terms of productivity. Often the estimated return on training is then interpreted as a lower-bound estimate of the wage effect.

A study by Dearden, Reed and Van Reenen (2000) based on a panel of British industries covering the years 1983 to 1996 reported that training significantly boosts productivity and, moreover, to a much larger degree than indicated in previous studies focusing entirely on the wage effects of training.

The underestimation of the productivity effects of company training is argued to be due to two major circumstances. Firstly, companies usually make training decisions

for some particular reason(s), such as negative demand shocks or low productivity, implying that training should be treated as an endogenous factor instead of being taken as exogenously determined. Secondly, their estimated wage effects of training are found to be only about half of those on industrial productivity<sup>2</sup>. Some studies in the USA have included the evaluating model of employer's internal rate of return on investment (ROI) in company training. Bartel (2000), concluded that the ROI in training is "much higher than previously believed".

### **Incidence and intensity of company training**

Bartlet and Sicherman (1995) found a positive link between training and education. To do the process of learning new skills simpler, this adds a value for the less educated employees. For the same topic Oosterbeek (1998), stated that the above positive relationship is due to the omission of ability; higher educated employees have a higher return in training, so they have a greater willingness to be part of the training than the less educated ones.

From the perspective of the firms, there is irrelevant if the employees are well educated or not. According to the OECD (2003) that the less-educated employees have lower incidence and intensity of training compared to their more educated counterparts.

Lynch and Black (1998), found, during a study conducted on employees in US manufacturing establishments that more employees were trained if there was a large portion of female employees. Also the training intensity was related even with the size of the firms: Larger companies provide formal training more often than smaller companies, this due to the higher training-related fixed costs in smaller companies.

### **Conclusions**

Through the review of the literature was evidenced that there are confusing definitions about training of the company; expression such as general' versus 'specific' training, or 'external' versus 'internal' training, are used during different period in the literature of company training.

There is a main reason why companies train: there is a possibility to earn rents due to imperfect labor market on their trained employees- the wage after training grows less and slowly than the productivity of trained employees.

There are the so-called "stylized facts' identified through empirical researches that are characteristics of job, or individual ones that affect the incidence of an employee to gain a training from company.

There is a link between education and training, stated and proved empirically in different researches. There is a little research made about the consequences on the career of an employee of training; even if is often present as topic in the economics literature as well as in policy debates. There is a higher interest studying the incidence, determinants, and effects of company training, supported by more reliable data and sophisticated research techniques and instruments. On the other hand, as

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<sup>2</sup> Barron, Berger and Black (1997) found the estimated effect on productivity growth to be approximately ten times the effect on wage growth.

the interest for the topic increases, so the confusion surrounding this literature does. Summarizing, the knowledge on the economic and social impact of company training should be used carefully when policies are formulated, taking into consideration the main problem of the imperfections of the market and the inequality access of employees to the company training (formal or not).

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