# Benefits and barriers of telework: perception differences of human resources managers according to company's operations strategy

M.P. Pérez [*], A.M. Sánchez , M.P. de Luis Carnicer

*Area de Organizació de Empresas, Centro Politécnico Superior, María de Luna, 3, Zaragoza 50015, Spain*

## Abstract

Telework as an integration of Information and Telecommunication Technologies with Human Resources management, means a new job organisation paradigm for companies working in the New Economy. However there are very few empirical studies that have analysed the perception differences of telework benefits and barriers in industrial and service companies. This paper contributes with empirical data to the relationship between the use of telework techniques and the implementation of this new work organisation with the company's operations strategy. The paper uses data from Spanish companies to test the relationship between innovation, employee training, and other production strategy performance parameters with the feasibility of telework adoption.
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*Keywords:* Telework; Operations and human resource strategy; Flexibility

## 1. Introduction

Telework is an alternative way to organise work that integrates two sources of competitive advantage: the own company's Human Resources and the new Information and Telecommunication Technologies. Although there is no agreement in literature about telework definition and its different meanings — telecommuting, remote working, homeworking — some common features allow us to consider telework as the complete or partial use of Information and Telecommunication Technologies to enable workers to get access to their labour activities from different and remote locations. In some studies, telework is viewed as encompassing a variety of intraorganisational functions (e.g. telecommuting, mobile work, and virtual corporation) and interorganisational relations (e.g. electronic data interchange and interorganisational team-based working). Perceived this way, the management of telework shares activities with the management of technology (information systems),

the management of innovation (organisational change), and the management of knowledge (technology flows).

Three main types of telework are usually found in operation: home-based telework, satellite offices, and mobile working. Home-based telework refers to employees who work at home on a regular basis, though not necessarily (and, in fact, rarely) every day. Home-based workers who are self-employed or who otherwise have no connection to a central workplace are not considered as teleworkers. A person can be said to be a teleworker if her telecommunications link to the office is as simple as a telephone; however, teleworkers often use other communications media such as electronic mail and personal computer links to office servers. Either the firm or the employee purchases the home-based equipment.

In satellite offices, employees work both outside the home and away from the conventional workplace in a location convenient to the employees and/or customers to reduce commuting time. It is in some sense a branch office whose purpose is to alleviate employees' commutation pronblems. The satellite office is equipped with office furniture and equipment provided by the firm; in addition, administrative help may be available there.

In contrast to teleworkers who work from one designated location outside the main office, mobile workers are frequently on the road, using communications tech-

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* Corresponding author. Tel.: +34-976-761-000; fax: +34-976-761-861.

*E-mail addresses:* manuela.perez@posta.unizar.es (M.P. Pérez), anmarzan@posta.unizar.es (A.M. Sánchez), pluis@posta.unizar.es (M.P. de Luis Carnicer).

nology to work from home, from a car, from a plane, or from a hotel — communicating with the office as necessary from each location. Marketing managers, salespersons or investment bankers are examples of mobile teleworkers.

The development of telework started in the 1970s but the number of teleworkers has been keeping below expectations. There are very few organisational studies that have analysed the influence of organisational features on company's telework adoption feasibility. Besides, much of the literature is speculative and anecdotal, and in some empirical studies the sample sizes are too small to warrant generalisation. The purpose of this paper is to study the relationship of a few production strategy's variables with telework benefits, barriers and feasibility. The next section reviews the main telework benefits and barriers for companies. Then the empirical study is divided into five sections: methodology, telework benefits and barriers; the differences of benefits and barriers according to some production strategy's variables; factor analysis of telework benefits and barriers; and contingency analysis with those variables which had a relationship with telework feasibility.

## 2. Benefits and barriers to telework

There are some studies in the literature which show the advantages and barriers to telework adoption and their organisational implications (Nilles, 1994; Kurland and Bailey, 1999; Shin et al., 2000). According to this literature, the main telework benefits for the company are the savings in building costs and the increase in their Human Resources productivity. Regarding the employee, telework gives them more labour time flexibility and less commuting time. The main telework disadvantages or barriers are the access to technology and the integration of telework with the company's strategy and organisational structure, as well as the teleworkers motivation and control (Table 1). This paper focuses the analysis on the organisational benefits and barriers of telework adoption for industrial and service companies.

The success of existing telework programmes is due primarily to the benefits of flexibility offered to both the company and the teleworker. The more flexible the working arrangements, the more likely that a worker will become motivated to perform in an effective, results-oriented manner (Nilles, 1994). Improvements in management effectiveness have also been widely noted. The notion of managing results rather than an employee's presence is increasingly seen as a key factor in the success of telework. Other positive telework results state that teleworker productivity is higher than that of the non-teleworkers. Productivity increases may be due to several factors such as selection procedures that favour highly motivated staff as teleworkers, or the establish-

Table 1
Some telework benefits and barriers (source: own elaboration)

| Benefits | Barriers |
|---|---|
| *For the company* | *For the company* |
| Office space savings | Organisational structure changes |
| Productivity increase | Equipment costs |
| Less absenteeism | Task selection mistakes |
| Labour relations flexibility | Employee motivation |
| Better customer service | |
| Management by objectives | |
| *For the employee* | *For the employee* |
| Flexibility | Organisational difficulties |
| Autonomy | Difficulties to teamworking |
| Personal freedom | Perception of status loss |
| Self-employment | Difficulties to promote |
| Cost savings | Psychological problems |
| Less labour problems | |
| Opportunity to disabled people | |

ment of pay and reward systems closely related to employee performance.

Telework benefits companies in ways beyond productivity. It enables them to cut costs related to office space, as well as to address space constraints. Another reason to adopt telework is that it widens the knowledge portfolio available to the organisation. Recruitment and retention of qualified employees is then seen as a significant benefit of telework programmes to employers. Recruiting becomes more effective because the flexible nature of a telework programme can be marketed as a unique benefit. Qualified employees with special needs such as family responsibilities or a geographic restriction can still be offered full employment status, thus giving the employer a competitive recruiting advantage. Employees are more likely to remain with a company where such flexibility is offered as long as career paths are defined for the teleworker. Administrators of telework programmes cite decreased turnover as one of the most desirable long-term benefits of telework to the organisation. In response to the decrease in the overall supply of qualified technical workers and the cost of replacing workers, any programme that can avoid employee turnover is extremely valuable. Similarly, managers of telework programmes report a lower absentee rate among teleworkforces compared with workers as a whole. Teleworkers support these statements by admitting that they had worked productively while feeling ill and if they could not have worked from home, they would have called in sick on some occasions.

Companies instituting telework programmes have felt the need to keep teleworkers 'visible' by requiring them to come into the office at least one day per week. This is considered necessary in order to keep them from becoming completely isolated from their peers and the social aspects of the office environment. Attachment to the corporate culture and the peer network is seen as