

MONITORING ABSENTEEISM: GUIDELINES FOR DIAGNOSIS, INTERVENTION AND CHANGE

Peter G. W. Smulders

TNO Institute of Preventive Health Care, Leiden

High rates of absenteeism are often a reason for employers to draw attention to the costs of absenteeism and to ask employees for punctual attendance behaviour. On the other hand employees and union representatives mostly underline the need for the improvement of the working environment. Finally, the governments - at least in some European countries - are interested in monitoring and managing absenteeism, because of social security expenditures.

Goodman & Atkin (1984) distinguished seven categories for which absence levels have consequences: the employees, the co-workers, the work group, the management, union officers, the family and, finally, the society as a whole. For all these categories there are positive and negative consequences involved in absenteeism. Positive effects for the employee and his/her family are, for example, the reduction of job-related stress and the opportunity to deal with family problems. A positive effect for the organisation is that, by job rotation, experience and job knowledge can be developed in the work force. Negative effects for the employer, of course, are decreased productivity and increased costs. Macy & Mirvis (1976) developed - with the help of decision rules - a method to measure the costs of absenteeism. They distinguished four main types of costs: productivity loss, overtime costs, replacement of personnel costs and additional training costs.

The conclusion from all this is that there are enough reasons for the parties involved to pay attention to absenteeism.

Determinants of absenteeism

In the first contribution to this workshop causal factors related to absenteeism were reviewed. Absence behaviour is not determined by only a few factors, but by many. It has been described as a multi-conditioned phenomenon (Smulders, 1983). A publication by two well-known American researchers in this field (Steers & Rhodes, 1984) presents eight clusters of causal factors: personal factors, work attitudes, job content factors, organisation-wide factors, economic and market factors, immediate work environment factors, external environment factors (such as seasonal fluctuations, weather conditions) and organisational change factors (such as alcohol programmes, health examinations, disciplinary programmes). Steers & Rhodes (1978) have used these empirical results for the construction of a model on absence behaviour, wherein their central causal line is: job situation → job satisfaction → attendance motivation → attendance. In addition, they concluded personal characteristics in the model as well as some external forces, such as the 'ability to attend' (family responsibilities, transportation problems) and 'pressures to attend' (such as incentives, norms, commitment).

In a Dutch review of available empirical research (Smulders, 1984) 32 causes were identified. They could be summarised in the following clusters: personal and/or demographic characteristics (such as age, sex, education, marital status, life style, etc.), task characteristics (autonomy, responsibility, etc.), physical working conditions, leadership style, pay and prospects, shift work/working hours, the financial implications of being absent, the financial and economic position of the firm, as well as some aspects of the national health care system (such as waiting time for hospitals and/or medical specialists, while being absent from work).

To conclude, it is important to underline that the employee, the employer, as well as their environment (the social security system, the economic situation, the health care system), all three are part of the causal process with respect to absenteeism.

A stepwise strategy for intervention projects

In The Netherlands a 'Guidebook for Managing Absence from Work in Organisations' (Smulders & Veerman, 1990) has been published. In this widely-used book the following strategic steps in intervention projects are distinguished and discussed:

1. Orientation on possible causal factors and possible risk departments/groups.
2. Registration and analysis of the actual absence data of their own organisation.
3. Carrying out additional research for the diagnosis of the problem (by way of surveys, observations, interviews).
4. Development of an action plan/formulation of measures.
5. Implementation of measures.
6. Evaluation of measures.

The first contribution to this workshop went into the first step (what direction in general do causal factors take and what may be the risk groups/departments in absenteeism?). In the second step it is emphasised that objective data on the level of the location of absenteeism are needed. The third step says that additional data (from questionnaires, checklists or interviews) are often needed. Both steps bring rationality and objectivity in the change process. A mix of objective information (facts) and subjective information (opinions on what should be done) is often most functional in bringing about change.

In the next section, we will present two instruments for respectively diagnosing causes of absenteeism and setting targets (steps three and four in the strategic change process).

The Dutch Work and Health Questionnaire for diagnosing absenteeism

To make it possible for managers, occupational health officers, personnel officers, works councils to get a broad insight into the work and health situation of a department of an organisation as a whole, and to be able to prepare strategic actions, the Dutch Work and Health Questionnaire (VAG Questionnaire) was developed by the TNO Institute of Preventive Health Care (an English version of the questionnaire is available, see Smulders, Gründemann & Winter, 1992). The questionnaire was designed for scanning

the broad spectrum of work and health. In addition, it was not developed for individual diagnosis, but to gain information at group level (plant, department, age group, male versus female employees, etc.).

The W & H Questionnaire includes ten concepts, covered by 41 items: job control and skill discretion (5 questions), job demands (6 questions), working conditions and safety (6 questions), work organisation (5 questions), supervision and colleagues (5 questions), pay and prospects (3 questions), the relation between work and private situation (1 question), overall evaluation of the job (1 question), general and psycho-social health (5 questions), and health behaviour/absenteeism (4 questions).

The questionnaire includes two groups of questions (job control and job demands) which are highly relevant for getting insight into work stress (see Karasek & Theorell, 1990). Secondly, it includes concepts, such as supervision, colleagues, pay and prospects, which - according to the Job Characteristics Model (Hackman & Oldham, 1975) - turned out to be important for the employee's satisfaction, motivation, and turnover. Thirdly, the health questions, in particular, in the questionnaire are very predictive for future absence from work (the correlations between one's health and one's absence rate turn out to be between $r = 0.20$ and $r = 0.50!$). The work items have moderate relations with actual and future absenteeism from work (see Table 1) and with future work disability.

Table 1: The impact of 7 work factors from the Dutch W & H Questionnaire on absence rate (regression coefficients; from about 800 male and female employees of two Dutch organisations)

		absence % in same year (high-low)	absence % three years later (high-low)
I.	job control (high-low)	0.08	0.02
II.	job demands (low-high)	0.18	0.09
III.	good work organisation (yes-no)	-0.09	-0.06
IV.	good supervision (yes-no)	0.00	-0.03
V.	good working conditions (yes-no)	0.03	0.10
VI.	good climatic conditions (yes-no)	0.01	-0.06
VII.	good pay and prospects (yes-no)	0.00	0.08
	Multiple R	0.20	0.15

A great advantage is that reference data are available with respect to the W & H Questionnaire. These are based on answers from about 17,000 employees in all kinds of functions and organisations. The data originated in three groups, each with thousands of employees, namely (a) about 6,500 employees in a selection of differing organisations (private and public, production and service), (b) about 2,000 employees in agriculture and horticulture, and (c) about 8,500 employees in institutional health care.

A method to establish targets in absence rates for departments

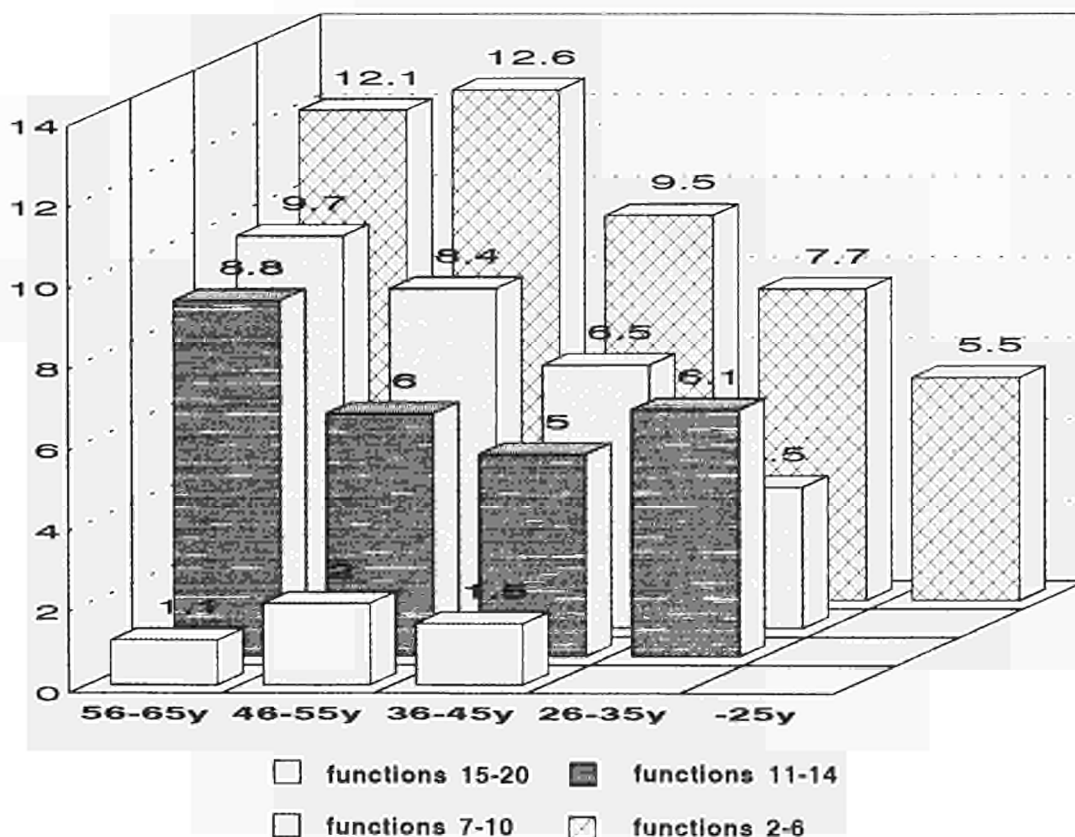
At least two absence measures may be distinguished: the absence rate (days absent per person per 100 days) and the frequency (number of spells per person per period). These measures may include short-term absence periods as well as periods of longer duration. The absence rate is a time-lost measure.

The starting point for the technique to establish targets or norms for groups or

departments in absence rates is the fact that - in almost all organisations - absence rates increase with age and decrease with function level. Older employees almost always have higher absence rates than younger employees and employees in higher function levels have lower rates than employees in lower function levels. These 'laws' are reflected in Figure 1, which shows the absence rates of age-groups and function groups of a large Dutch county agency in the city of The Hague. We see, for example, that the oldest employees (56-65 years) in the lower functions 2-6 had a mean absence rate of about 12% and that the employees of 36-45 years and in higher functions 15-20 had a mean absence rate of only 1-2%.

Knowing this 'law' in absence behaviour, it is not correct to ask, for example, the management and employees of a department with a relatively older work force, with many people working in lower function levels, to have the same mean absence rate as a department with relatively many young employees, working in higher functions.

Figure 1: Absence rates in 1991 in a large Dutch county agency (2,146 male and female employees together)



Having knowledge of these 'laws', it is possible to calculate, on the basis of mean absence rates of age and function groups, norm or target rates for departments in organisations. Thus, the norm rate of a department is the absence rate it should have, when 'demographic composition' of the department is standardised. In The Netherlands the multinational Philips uses this technique for managing absenteeism.

References

- Goodman, P. & Atkin, R. 1984. *Absenteeism: new approaches to understanding, measuring and managing employee absence*. San Francisco, Jossey-Bass
- Hackman, J. R. & Oldham, G. R. 1975. Development of the job diagnosis survey. *Journal of Applied Psychology*, **60**, 259-270
- Karasek, R. A. & Theorell, T. 1990. *Health work; stress, productivity and the reconstruction of working life*. New York, Basic Books Inc.
- Macy, B. A. & Mirvis, P. H. 1976. A methodology for assessment of quality of work life and organisational effectiveness in behavioural-economic terms. *Administrative Science Quarterly*, **21**, 212-226
- Rhodes, S. R & Steers, R. M. 1990. *Managing employee absenteeism*. Reading, Mass., Addison-Wesley
- Steers, R. M. & Rhodes, S. R. 1978. Major influences on employee attendance: a process model. *Journal of Applied Psychology*, **63**, 391-407
- Steers, R. M. & Rhodes, S. R. 1984. Knowledge and speculation about absenteeism. In *Absenteeism: New approaches to understanding, measuring and managing absence*, ed. P. S. Goodman and R. S. Atkin. San Francisco, Jossey-Bass

Smulders, P. G. W. 1983. Personal, non-work and work characteristics in male and female absence behaviour. *Journal of Occupational Behaviour*, 4, 285-295

Smulders, P. G. W. 1984. *Balance of 30 years absence research: the results of 318 studies summarised*. [In Dutch: Balans van 30 jaar ziekteverzuim-onderzoek: de resultaten van 318 studies samengevat]. Leiden, TNO Institute of Preventive Health Care

Smulders, P. G. W., Gründemann, R. & Winter. 1992. *Work and Health Questionnaire*, TNO Institute of Preventive Health Care

Smulders, P. G. W. & Veerman, T. J., eds. 1990. *Guidebook for Managing Absence from work*. [In Dutch: Handboek ziekteverzuim: gids voor de bedrijfspraktijk]. The Hague, Delwel