

# **Introduction to the Preparation of Manuals on Occupational Stress**

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The many manuals which have been produced on the prevention of occupational stress address the subject in different ways, covering a wide range of contents, target groups and styles of presentation. For instance, some publications are very comprehensive and discuss, in detail, various methods used to deal with stress at different levels, while others focus on specific aspects, such as a strategy for stress reduction. Some are directed at a particular category of workers and others at workers in general, while some specifically address trainers. Some documents are written in an academic or scholarly style, while others are more practically oriented and use more concrete, everyday language.

Despite all these differences, manuals on stress usually tackle the subject in the following sequence. First of all, the signs and symptoms of stress are analysed, and indications are provided on its magnitude and cost, with a view to helping readers to recognize the existence of stress and the need for action. Secondly, the causes of stress or stressors are reviewed, in order to facilitate their identification, and the consequences of stress are assessed. Thirdly, after some understanding about stress has been grasped, action to eliminate or relieve stress is discussed.

This introduction to the preparation of manuals on stress follows the same presentation sequence adopted by most manuals. However, before considering the contents of the manuals, a series of preliminary decisions need to be taken which are of paramount importance for the quality and effectiveness of the message to be delivered. These include: the *choice of the approach* to be adopted by the manual; and the *identification of targets*. Consideration is then given to the actual content of the manual.

## **1. Choice of the approach**

Based on the experience gained by previous ILO analyses, a combination of the following approaches is suggested.

### **Preventive**

In the past, stress has sometimes been considered merely as a personal problem to be tackled with remedial, occasional and often palliative interventions. The emerging approach, however, focuses on a pro-active response to stress with emphasis on

preventive measures and elimination of the causes of stress, rather than on the treatment of its effects.

This preventive approach is shared by a growing number of experts and organizations operative in the field. As Professor Lennart Levi points out, "*an ounce of prevention is worth a pound of cure*" [L. Levi: Preventing work stress (Adison - Wesley, Reading, Massachusetts, 1981), p.81.].

Similarly, Professor Robert Karasek indicates that "*the extraordinary breadth of the existing literature on psychosomatic causes of illness argues for integration of our understanding of environmental causes at work with the research on psychological and physiological mechanisms of individual response to the environment. Our approach is to link causes based in the environment and causes based in the individual, but with environmental causes as the starting point*" [R. Karasek and T. Thjorell: Health work: Stress, productivity and the reconstruction of working life (Basic Books, New York, 1990), pp. 8 and 9.].

The idea that prevention can be the winning weapon to combat stress has been strongly emphasized by the National Institute for Occupational Safety and Health (NIOSH) in the United States: "*A prevention strategy for health disorders must take account of both causal mechanisms and factors that perpetuate the disorders. Generic approaches tend to focus on the interplay of host, agent, and contextual factors*" [NIOSH: Proposed national strategies for the prevention of leading work-related diseases and injuries:: Psychological disorders (Cincinnati, 1988), pp. 6-7.].

## **Positive**

Preventive approaches to stress are thus becoming increasingly relevant in terms of research and policy orientation, and are opening new paths for intervention in the fight against occupational stress.

Many manuals deal extensively with the description of the symptoms and the negative effects of stress. However, when it comes to proposing practical action, the advice given often becomes vague and uncertain and little guidance is provided which delivers a positive and substantial message. In enterprises, efforts are emerging which tackle stress problems at their roots, deal with them in a systematic way and involve a long-term appreciation of the results of each anti-stress intervention. Such positive experiences should be the core of innovative strategies based on sharing and expanding their positive message.

The manuals should highlight the importance of such efforts, the potential for action and the lessons of successful cases. A short description and commentary of key cases therefore greatly enriches their content and effectiveness. The cases referred to in this webpage offer a number of examples.

It is therefore essential that the manuals clearly indicate how the measures suggested are likely to yield both health and productivity results at relatively contained costs; how they can become an integral part of the necessary organizational development of a sound

enterprise and, when a proper cost benefit cycle is activated, how they can pay for themselves.

## **Participatory**

A participatory approach means that all the parties concerned should have an active role in designing and implementing anti-stress initiatives. The positive impact of a participatory approach to the success of anti-stress programmes is broadly recognized. Such an approach also presupposes that all parties consider it worthwhile to work together in reducing work related stress. If there is no real commitment from these parties then there is a high risk that an initiated stress project will not be successful and will fail in its final objectives. However, for a participatory process to occur, broad institutional support is needed, perhaps in the form of a joint labour-management programme, in order to create the trust necessary for open communication. It is particularly important to clarify, especially among low-status workers, that workers who share openly about their feelings of job stress, and their ideas for changes in the work environment, are not only protected from reprisals but valued for their positive contribution by the management. Only in such an atmosphere can new awareness be shared and joint new action developed.

## **2. Identification of targets**

### **The target audience**

The identification of the target audience is essential to make the manuals effective enabling tools in eliminating or alleviating stress at work. As they are intended to stimulate action, their primary audience will consist of managers, supervisors, workers, workers' representatives, health operators and engineers who have a concrete interest in introducing anti-stress programmes within their enterprise. In a broader prospective, a secondary (but no less important) audience will consist of policy-makers, as well as officials of governments, workers' and employers' organizations with a direct interest in this area.

It is for the authors of the manual to choose whether it is to be targeted at one specific group or at a multi-group audience. The language and content of the manual will have to be adapted accordingly. It is also possible to target different groups by means of different products forming part of a more general design.

### **The target occupations**

If the manual is targeted at a specific occupation which is particularly likely to suffer from stress, a preliminary understanding of the relative importance of stress for such an occupation vis-à-vis other occupations at risk is a crucial step in the preparation of such manuals. The "*Karasek model*", which describes the characteristics of workers' tasks that are associated with psychological stress, can be of great help in this respect (see [Figure 1](#)).

According to this model, it is not only the psychological demands of work that lead to stress and related illnesses, but a situation of high demand combined with low worker control over the work process. Stress occurs when workers are constrained from responding to the stressor on the basis of their own optimal psychological and physiological response pattern, because of external factors over which they have no control. In contrast, motivation can be achieved when the demands of the task are met according to a response pattern that is determined by the workers.

The model seems to capture some important stressful job circumstances: the low-control, high-demand tasks, particularly in combination with low social support. In Figure 1, the vertical dimension of decision latitude (increasing towards the top) and the horizontal dimension of psychological job demands (increasing to the right) create four quadrants. If the figure is considered rapidly in terms of the health consequences of work, the following is found: stress is strongest in the lower right quadrant (high demands, low decision latitude); the upper right quadrant (high demands, high decision latitude) is called active work; the diagonally opposite situation is called passive work (low demands and low decision latitude); and low strain work is in the upper left quadrant.

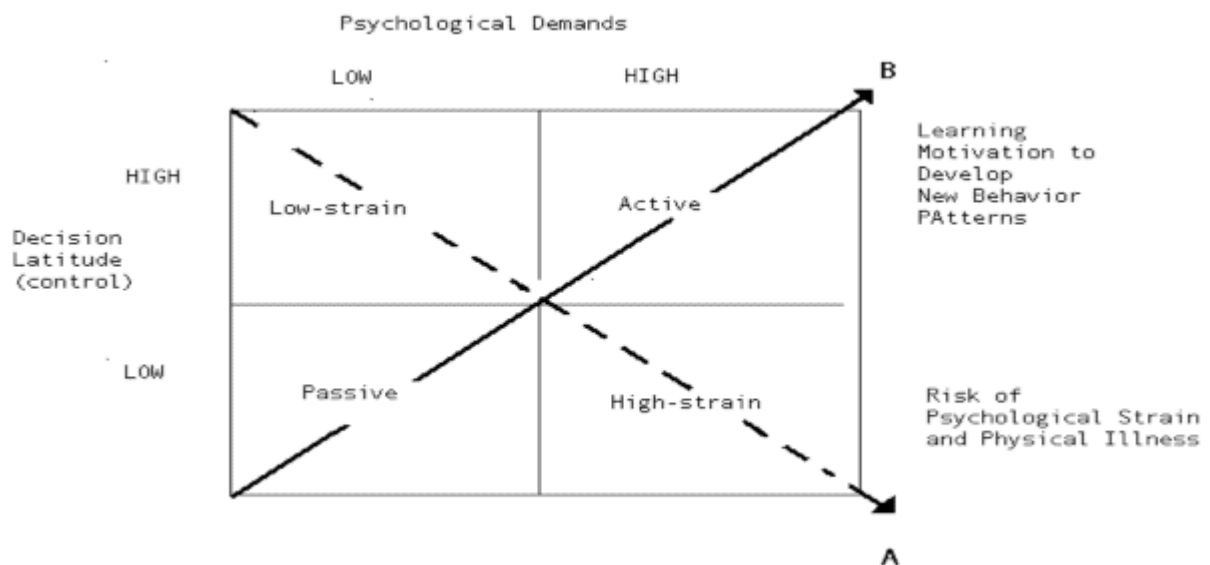


Figure 1: Psychological demand/decision latitude model

The use of this model, by locating the category of workers under consideration in the quadrant, can facilitate understanding of the factors involved in the generation of stress and the identification of the most appropriate measures to combat stress.

### 3. The notion of stress

The manual will need to refer to a definition of stress. However, defining stress is a very complex matter which is the subject of different analyses and continuous debate among experts. Beyond the details of this debate, a general consensus can be reached about a

definition of stress which is centred around the idea of a perceived imbalance in the interface between an individual, the environment and other individuals. When people are faced with demands from others or demands from the physical or psycho-social environment to which they feel unable to adequately respond, a reaction of the organism is activated to cope with the situation. The nature of this response depends upon a combination of different elements, including the extent of the demand, the personal characteristics and coping resources of the person, the constraints on the person in trying to cope and the support received from others.

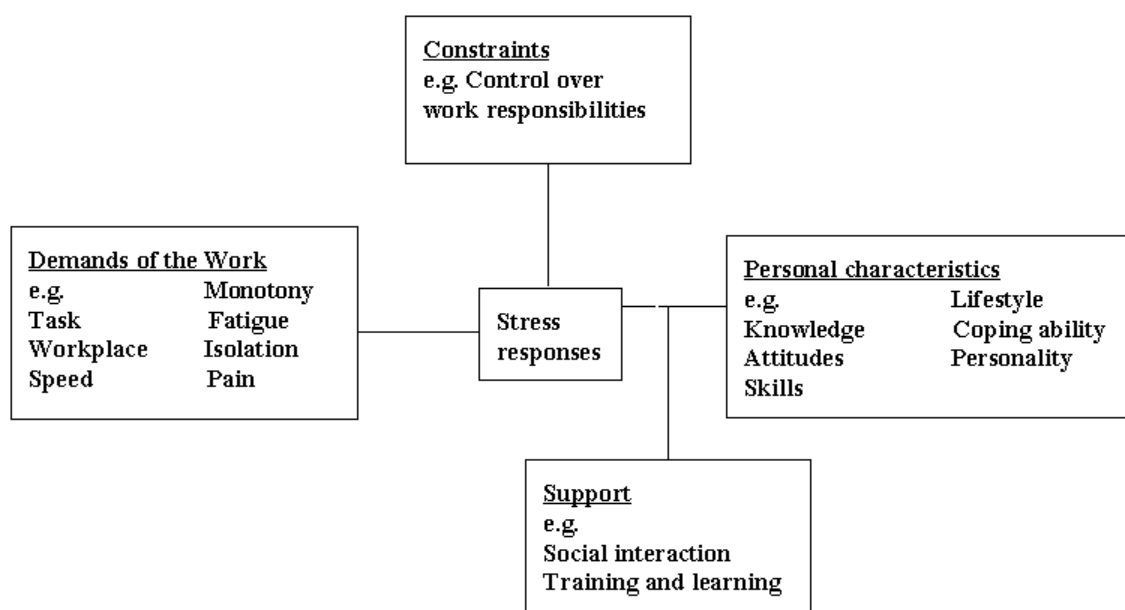


Figure 2: Factors involved in the perception and experience of stress

The notion of stress thus challenges traditional categories because it bridges physical, mental and social well-being. In introducing such a notion to their manual, the authors may wish to highlight some of the above-mentioned aspects.

#### 4. A step-wise development

The manual can then go on to identify a series of essential steps for the prevention of stress. These include:

- [stress recognition](#);
- [stress assessment](#);
- [anti-stress intervention](#);
- [monitoring and evaluation](#).

#### Stress recognition

The importance of early recognition of the signs and symptoms of stress is broadly emphasized in the literature. Manuals, in more or less detail, discuss signs and symptoms in the individual and in the workplace which indicate that stress is present and that it is

necessary to act. Even though each of the signs and symptoms of stress may be due to other factors, the occurrence of several of these signs and symptoms at once may require the need to take anti-stress action.

At the individual level the following physical, behavioural, mental and emotional signs may be apparent:

- dry throat, muscle, tension, headaches, indigestion, tics, insomnia, high blood pressure, etc.;
- irritability, impulsive behaviour, difficulty making decisions, sudden increase in smoking or alcohol use; etc;
- excessive worrying, feeling of worthlessness, brooding, forgetfulness, easily startled, day-dreaming, etc.

At the workplace level, high levels of absenteeism, staff turnover, work accidents (including minor accidents) and disabilities are often linked with stressful situations. Low productivity levels, poor quality production, frequent breakdowns and difficult inter-personal relationships in the workplace may also be associated with stress.

### Stress assessment

Given that the goal of any stress control programme is to manage specific causes of stress and their effects, related to both the work situation and the personal characteristics of the individual, an effective programme requires proper identification of the stressors causing high-stress situations and assessment of the work performance and personal problems derived from stress.

With a view to such assessment, several manuals propose involving workers in identifying those stressors which, they feel, cause unnecessary stress in their jobs and in rating them to establish priorities for intervention. The assessment should be done in a systematic way and employees should be asked to express their concern about any situation that may be causing stress at work.

In this respect, recourse to an "audit" of the relevant hazards, as exemplified in the following checklist, can prove particularly helpful.

| Work characteristic                 | Hazardous conditions<br>(High likelihood conditions)         | Absent/Low -or-<br>Present/Medium<br>-or-<br>Obvious/Severe<br>(please specify) |
|-------------------------------------|--|---|
| Organizational function and culture | Poor communications<br>Organization as poor task environment |   |

|                                     |  |  |
|-------------------------------------|--|--|
|                                     | Poor problem-solving environment<br>Poor development environment   |  |
| Participation                       | Low participation in decision-making   |  |
| Career development and job status   | Career uncertainty<br>Career stagnation<br>Poor status work<br>Work of low social value<br>Poor pay<br>Job insecurity or redundancy                                  |  |
| Role in organization                | Role ambiguity: not clear on role<br>Role conflict<br>Responsibility for others or continual contact with other people   |  |
| Job content                         | Ill-defined work<br>High uncertainty<br>Lack of variety<br>Fragmented work<br>Meaningless work<br>Under-utilization of skills<br>Physical constraint                 |  |
| Workload and work pace              | Work overload<br>Work underload<br>High levels of pacing<br>Lack of control over pacing<br>Time pressure and deadlines   |  |
| Working time                        | Inflexible work schedule<br>Unpredictable hours<br>Long hours or unsocial hours<br>Shift/Night working   |  |
| Interpersonal relationships at work | Social or physical isolation<br>Lack of social support from other staff<br>Conflict with other staff<br>Violence<br>Poor relationships with supervisors and managers |  |
| Home-work interface                 | Conflicting demands of work and home<br>Low social or practical support from home<br>Dual career problems  |  |
| Preparation and training            | Inadequate preparation for dealing with more<br>Difficult aspects of job<br>Concern about technical knowledge and skill  |  |

|                |  |  |
|----------------|--|--|
| Other problems | Lack of resources and staff shortages<br>Poor work environment (lighting, noise, bad postures) |  |
|----------------|--|--|

From: T. Cox and A. Griffith: Manual on Occupational Stress in Nursing, ILO (1994).

### **Anti-stress intervention**

Once the existence of stress has been recognized and the stressors identified, action to deal with stress should be taken. Assuming that stress is a misfit between the demands of the environment and the individual's abilities, the imbalance may be corrected, according to the situation, either by adjusting external demands to fit the individual or by strengthening the individual's ability to cope, or both. At this point, it should be borne in mind that since stress is a multifaceted phenomenon, no simple solution is available. Furthermore, differences in the particular circumstances of each case make it impossible to provide a unique solution for the management of stress.

A wide range of practical guidance on the management of stress is found in the literature. In general, and regardless of their differences, publications conclude that the ideal solution to combat stress is to prevent its occurrence. This may be achieved by tackling the core of the problem - the cause. However, there is no single cause of stress and the elimination of all stressors is an utopian task. Therefore, action should be aimed at eliminating as many causes as possible, so that the action taken reduces stress and prevents future stress. As this cannot always be achieved in the short term, it is generally agreed that improving the ability to cope with stress is a valuable strategy in the process of combatting stress.

Wide-ranging types of interventions may thus be considered in the manuals, leaving the choice of the most effective combination to the target audience according to the specific features of the particular work situation. The following is a possible list of types of intervention, ranging from interventions targeted at the work environment to those targeted at the individual.

- **Intervention of the external socio-economic environment**
  - Legislation, international and national directives
  - Social support
  
- **Intervention on technology and work organization**
  - Improving job planning and reliability of the work systems
  - Reduction of working times and arrangement of working teams and rest pauses in relation to the work load
  - Arrangement of shift schedules according to psych-physiological and social criteria
  - Participation in decision-making
  
- **Intervention in working place and task structure**
  - Improving the work environment



- Lighting
  - Noise
  - Micro climatic conditions and indoor air quality
- Arranging workplaces according to ergonomic criteria
  - Workstation design
  - Working with visual display units
  - Sitting postures
- **Intervention to improve individual responses and behaviour**
  - Individual ways of coping with stress
  - Selection and training
  - Counselling and other supporting measures at the company level
- **Specific intervention for health protection and promotion**
  - Appropriate medical surveillance

Since practically all the above-mentioned measures can, in principle, be beneficial for all the occupations affected by stress, particular attention needs to be paid to avoiding the risk of generalization. Each manual should therefore deal with the specific measures relevant to the particular occupation under consideration (i.e if improved organization of working time is referred to as a measure for the prevention of stress for nursing personnel performing shift work, practical shift arrangements should be proposed).

### **Monitoring and evaluation**

Finally, it is important for manuals to propose effective monitoring and evaluation systems. A distinction is usually made between active (process) and reactive (outcome) monitoring systems.

Reactive systems tend to monitor accidents, ill health and incidents. They generally recognize and report on, inter alia, injuries and cases of ill health and other losses, such as damage to property, incidents and the existence and nature of potential hazards. Ensuring the reporting of serious injuries, or long-term illness, generally presents few problems to organizations, although the validity of stated diagnoses may sometimes be questionable. However, the reporting of minor injuries, other loss events, incidents and hazards tends to prove more difficult. Active systems are therefore needed to monitor the achievement of plans and the extent of compliance with procedures and standards. These should be process-oriented and provide feedback on occupational health performance before accidents, ill health or incidents occur.

Special emphasis is usually placed on the importance of active monitoring. However, both types of measurement are required and these should be properly integrated into a coherent system of monitoring according to the particular characteristics of the occupation covered by the manual.

Some effort is required in the design of monitoring systems to allow for evaluation.

Monitoring and reporting of hazards and occupational health problems can be promoted by a number of different factors, including training and organizational development. First, training can serve to clarify the nature and requirements of the monitoring system. Second, the development of a health and safety-conscious organizational culture serves to emphasize the importance of an observant and responsive approach to occupational health and of improving systems of control and monitoring before harm occurs. It should also encourage open and honest communication.