

ing schedule. These objectives can be considered in three parts. The objectives must be balanced and priorities set bearing in mind the constraints that apply to the given task.

3.1.1 Safety

The lighting installation must be electrically and mechanically safe and must allow the occupants to use the space safely. These are not only primary objectives but also statutory obligations. It is, therefore, necessary to identify any hazards present and the need for emergency lighting (see section 3.8.6, Emergency lighting).

3.1.2 Visual tasks

The type of work which takes place in the interior will define the nature and variety of the visual tasks. An analysis of the visual tasks (there is rarely just one) in terms of size, contrast, duration and need for colour discrimination is essential to establish the quantity and quality of the lighting required to achieve satisfactory visual conditions.

In a 'general' office, for example, at one extreme the task may be to answer the telephone (a simple visual task). At the other extreme the occupants may have to transcribe text, handwritten in pencil, using VDTs. This presents a complex set of visual tasks. In addition to establishing the nature of the tasks it is also necessary to identify the positions and planes on which the tasks lie. This information is essential if lighting matched to the tasks is to be provided.

3.1.3 Appearance and character

It is necessary to establish what mood or atmosphere is to be created. This is not just for prestige offices, places of entertainment, and the like, but should be considered in all designs, even where it will be given less importance than other factors.

3.1.4 Priorities and constraints

The above objectives will not have equal weight. Some will be 'essential' while others can only be 'desirable'. The evaluation will depend upon the priorities and constraints set by the client or the application.

Often the most obvious constraint is financial. Few clients want to spend more than is necessary to meet their brief and objectives. Different clients will allocate more or less to meet the various objectives according to their own valuation of the final result. This will temper and modify the importance of the various design objectives, but should be opposed if solely financial consideration suppresses any of the essential requirements of the design solutions.

Both capital expenditure and running costs should be considered to achieve the most economical scheme. This does not always happen because a second system of budget control applies to the running cost. This is an unsatisfactory approach and should, if possible, be resisted. Capital and running costs should