

sound, not the energy contained in separate pitch ranges. Suggested terms for characterizing noises encountered in such surveys are: dominantly low-pitched; humming; hisses; squeals; high-pitched whine; steady; intermittent (percussive or otherwise); staccato; etc.

For all studies in which correlations are to be made with physiological data (especially, hearing tests of thresholds for a series of pure tones) measurements should be made not only of the "over-all" intensity of the noise but also of the intensity of each of the various parts of the frequency spectrum of the noise, using for this purpose a sound level meter equipped with "band-pass filters." The use of such equipment will, in general, be an outgrowth of interest aroused by the information obtained in the simple surveys.

In plants where pure tone audiometers are available, or can be made available, serial observations should be made of workers exposed to the various types of noises. To be of most value, such examinations should begin with the pre-exposure periods (i. e., preemployment examinations should be made).

One of the objections apt to be encountered in persuading an industrial organization to initiate a study in the field of noise is an apprehension that the investigation may result in claims, just or unjust, and that it is better to do nothing. It may be possible to overcome this objection, if raised, by avoiding the testing of the hearing of any but new employees, on whom adequate preemployment and follow-up examinations can be made.

In some instances (for example, when publication of incomplete or uncontrolled data might be interpreted improperly or incorrectly) restriction of the findings of surveys of the noise hazards of a plant may be required. Such requests, of course, must be respected, but in such cases it should be pointed out that it is possible to make the observations of assistance to others without revealing the source of the data to other than the members of the Subcommittee on Noise in Industry, of the American Academy of Ophthalmology and Otolaryngology. The services of this committee group, as a continuing agency, will be available to coordinate and evaluate reports, and the use of any information furnished it will be restricted as requested by the supplier.

Important data bearing on the subject probably exist already in the files of many industrial hygiene and medical departments. Much of this data doubtless is "negative" in the sense that it indicates no injurious exposure. Much of it probably is fragmentary, adequate to satisfy the plant authorities but not sufficiently complete to merit publication as a well-rounded study. The reporting of such data, even though restricted, to the Subcommittee on Noise in Industry (address given in conclusion 6, above) would aid materially in the job of assessing the real magnitude of the problem and planning further studies.

If the noise hazard proves to be of the magnitude indicated by the discussions at the recent conference, industry will become increasingly receptive to the idea of controlling noise at the source, even though the procedure may be initially more costly than the use of personal protective equipment. An analogy can be drawn from the experience with respiratory hazards. Good industrial practice now allows respirators or masks to be substituted for mechanical ventilation only where the operation cannot be controlled reasonably by engineering methods. Reliance on personal protective devices always carries the risk of variable employee acceptance and cooperation and the difficulties of providing and servicing sanitary equipment.