

remarkable. They have shown hyperplasia of the lamellar cortical bone, but evidence of inflammation or subperiosteal hæmorrhage has been lacking.⁷ A recent study, however, has shown distinct inflammation with septic foci, so that we may have to alter our conception of the condition and place it in the group of bone infections.⁶ Fibro-fatty degeneration of the overlying muscles has been recorded.

The etiology is quite unknown. A low-grade infection is suggested by the elevated sedimentation rate, fever and leukocytosis, but inflammation has not been a feature of the biopsied tissue. Blood cultures and virus studies have been negative.

The prognosis is usually excellent, and rapid spontaneous regression of the lesion is the rule, with complete recovery within a year in most cases. It is important to recognize this disease and know of its prognosis, as a case is known to the authors in which the mandible was resected because of an erroneous diagnosis of bone sarcoma. It is in such cases that a bone biopsy should be done to satisfy both parents and doctors.⁶

Fatal cases have been recorded and an occasional case becomes chronic and leaves crippling residue. Because of this possibility, cortisone should be given to all severe cases in a dosage of about 200 mg. daily for two or three weeks and then in gradually reduced doses over a similar period. Abrupt cessation of the drug has been followed by rapid recurrence of symptoms. With corticoids the infant becomes asymptomatic within a few days, but soft tissue and bony changes may take several months to regress completely.

SUMMARY

The first case of infantile cortical hyperostosis in an Indian infant is recorded. The affection was typical and spontaneous regression of the lesions occurred without specific therapy.

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THE EVALUATION OF TREATMENT

"It is the patient who must believe in any treatment more than the doctor. Nevertheless, one might wonder whether a remedy would be more effective prescribed by one who believed it to be therapeutically important compared with one who realized he was prescribing a placebo. If this be so, scepticism has a danger—namely, that it may breed nihilism, where no treatment is given to a patient with a disorder on the grounds that no treatment has been shown statistically to alter its natural history. I suspect it will unhappily be a long time before therapeutics becomes a science needing no support from the magic mandragora."
—From a letter to the editor, *M. J. Australia*, 1: 232, 1958.

Special Article

THE CONCEPT OF NORMAL IN MEDICINE

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AN IMPORTANT source of difficulty between those seeking to communicate with each other is created when one individual or group uses any word intending it to mean something very different from the way it is interpreted. The resulting difficulty is encouraged if there is little or no awareness of the multiplicity of meanings which may be attributed to any one word and if the persons who are attempting to communicate are each confident that the meaning with which they invest a particular word is its only "real" meaning.¹ The present report is the result of a study of the many meanings currently applied to the word "normal" by physicians and others interested in medical problems. Each of the various meanings may be best suited to the needs of the group using it,² but this variety of meanings frequently gives rise to confusion, particularly when members of different groups attempt to communicate.

A philosopher discussing a problem of mutual interest with a physician flatly states, "The normal is simply the most usual and I have an inclination to use it that way."³ A psychologist states, in his textbook, that the term normal always refers to the middle of the distribution and that the idiot is about as abnormal as the genius.⁴ An educator⁵ and a neurologist⁶ use the word in a similar manner.

At the other end of the gradient of meaning is a standard of normality which is beyond human achievement.^{7, 8} Probably most psychoanalysts use normal to indicate the perfect and ideal.^{7, 9} This use also has support from the allied professions. Physicians frequently use normal with the technical significance with which it is used in ethics implying what ought to be.

Many use normal with meanings which lie in between these two widely separated significations. Stevenson states that when any considerable number of people think in a common way or behave in a common way, such thinking or behaving becomes normal for them regardless of how abnormal it seems to other groups;¹⁰ and Pasamanick emphasizes that what we of a different class consider unacceptable behaviour may be acceptable not only to a majority but may be statistically normal for an area.¹¹ An anthropologist specifies that spirit possession, for example, is a normal experience when a reasonably independent

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society defines it in that way.¹² A physician feels that normal indicates more than average and equates it with healthy.¹³ Adolf Meyer used normal to indicate one who was carrying on his own affairs with reasonable competence and showing no signs of heading progressively into trouble or of deteriorating.¹⁴ Many other writers in medical and related fields equate normal with value to the individual and to the species.^{15, 16, 28, 29} Occasionally, normal is used to refer to functioning in accordance with structure,¹⁵⁻¹⁹ but others point out that normal defined on a basis of structure can only be defined in hopelessly broad terms.

Frequently normal is used with other nuances of meaning. Koffka believed that the normal was the most frequent because of its normalcy and not the normal because of its greater frequency.²⁰ His hypothesis suggests that minor character deviations may carry with them protection paralleling minimal tuberculous infections. Freud believed that normal should be used to indicate an ideal,^{21, 22} but in translations as well as in the works of analysts²³ it frequently indicates persons one can expect to meet in the course of the day's work.^{24, 25}

In conversations physicians use normal in a manner similar to some one of the definitions which appear in the literature if they stop to think about it, but if used casually normal takes on a special significance. Under these circumstances it indicates not only the statistical normal but it also includes all the deviations from the statistical normal in the direction of the ideal.

From the point of view of successful communication it is not necessary and probably not desirable to accept any one definition, but it is necessary to be aware of the particular meaning, from the gradient of potential meanings, with which a word is being used.

SUMMARY

A survey of medical literature indicates that the "normal" may indicate the statistical normal, the ideally perfect or any variation between these two limits. When used verbally it may indicate the mathematical normal and all variations from it to the ideal.

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SHORT COMMUNICATION

FINALGON*

THERMAL MODIFICATIONS

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TOPICAL APPLICATION of counter-irritant substances for the treatment of pain is as ancient as the history of medicine. Camphor, turpentine, and mustard seeds were the first substances used. This method had no scientific basis but seemed to be founded on practical commonsense. Nowadays, many ointments are still available for the relief of pain, but before use their chemical formula, mode of action and effects in various disorders should be considered.

Finalgon§ is one such new ointment. It has two constituents causing hyperæmia: the beta-butoxyethyl ester of nicotinic acid and nonyl acid vanillylamide. In the Rheumatism Department of the Hôpital Ste-Foy, Quebec, it has been clinically investigated in 16 patients with various disorders—disc degeneration, fibrositis, peri-arthritis of the shoulder, rheumatoid arthritis, lumbago, and ankylosing spondylitis.

In order to evaluate the hyperæmic action of Finalgon ointment and determine the rise in skin temperature it produces, a thermocouple was used every 15 minutes after its application. Fig. 1 illustrates the results. The average rise in temperature was 5.2° F. after an hour.

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