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S A N

INAUGURAL DISSERTATION,

ON

Epilepsy

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BY

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If diseases are ranked according to the severity and disastrous consequences, which they produce on the human family; there is none, in the whole catalogue, extensive as it is, that claims precedence to Epilepsy.

This we understand to be a disease of the nervous system, which is the most delicate and highly organized of any in the animal economy, fulfilling the most important functions that humanity is privileged to exercise; hence a disease having its seat in such tender organs should demand from the medical world the most profound and thorough investigation. And although distinguished physicians have pronounced this disease when, even, unaccompanied with deformity of the cranium or imbecility of the mind

incurable; yet, we think it is the duty of every physician, who may be called to treat such cases, to hold back such a prognosis until he shall have exhausted every effort, to recover in the patient; each function disorganized, and shall have wasted the whole armory of the empiric.

Each year the industry of the naturalist, the ingenuity of the Chemist or the mechanist, discloses new agents or more refined experiments, for the purpose of abating the disorders arising from irritations and pains - in short the multiplied infirmities and discencies, which are being made in medicine, and all its collateral branches, added to the improved mode of studying diseases; - with the facility of post-mortem

examinations, together with what
is already known of this fearful
disease, may we not hope,
that physicians will soon acquire
such knowledge of the various cau-
ses of this disease, and skill in
treatment, if not permanently
to cure it, greatly to alleviate the
unfortunate sufferers whom it
has seized as its victims,
and not only of this disease may
that hope be cherished, but of all those
which have been termed "affection in
medicine,"

Epilepsy whether considered in its im-
mediate phenomena or in its remote
consequences, has in all times and
countries been considered one of
the most distressing and deplora-
ble of all human maladies,
its tendency to impair the understanding,

To produce debility and even total abolition of the rational power, lead often to a condition infinitely more lamentable than death itself.

This disease has in the history of medicine received various appellations according to the different authors who have described it, though the one or the other the more appropriate Epilepsy, the name which seems preferable at this time is derived from the Greek word *Empyia*, signifying a Seizing, an abrupt invasion, this disease may be either idiopathic or symptomatic, characterized by convulsions returning at uncertain intervals accompanied with the loss of sensation and a convulsive motion of the muscles, its attacks may be sudden or preceded by forem-

surrounding symptoms - such as a confused and wandering state of the mind, vertigo, ringing in the ears, indistinct vision, pain in the head, suffering and anxiety in the maecephal region, spasmodic twitches of the muscles, a warm glow, which proceeds from the extremities towards the head called "aura epileptica," the countenance exhibits feelings of fear and alarm and these symptoms "denote themselves more truly, in the approach of the paroxysm."

This disease has also received the name of "falling sickness," from the fact that the patient falls if in an erect posture when the paroxysm comes on - a symptom of the Paroxysm.

The first thing that we notice is the piercing and intense

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cry, which the patient generally, though not always, utters, and if in an erect position he falls suddenly, senseless and convulsed, he strains and struggles violently. The countenance is frightfully distorted of a livid, and sometimes almost black hue, occasionally pale. The veins of the head and neck turgid, the heart palpitating violently, breathing is oppressed and laborious, a choking sound is heard in the windpipe, he seems to be strangling, he foams at the mouth, a frothy saliva, which is more free towards the termination of the paroxysm, a constant grinding of the teeth, a quivering of the pleis in the neighborhood, if the muscular contraction, in short the patient seems to be suffering all the agonies of death, but presently, and by degrees

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These alarming phenomena diminish, and at length cease, the patient is then left in an exhausted condition, and as the convulsions depart a stupor or deep-sleep comes on, after which the patient wakes, apparently well, with the exception of a mental stupor or confusion which often continues for many hours, the countenance exhibiting a fatigued cast. The duration of these paroxysms vary from a few minutes to many hours, sometimes following each other in quick succession, to as many as five or six.

It has been remarked that one side is frequently more powerfully convulsed than the other, sometimes the convulsions commence in the extremity on one side and proceed towards the head, the head

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contracts and twists — to one side
and it not infrequently happens
that the urine and feces — are expelled
during the violence of the Spasms,
and even dislocation is effected by the
contractions of the muscles, such joi-
nts as generally the jaws and shou-
lders, the Tongue is sometimes caught
between the teeth, and violently bit,
which causes the bloody foam above
observed, and so powerful are these
spasmodic convulsions that the
teeth are fractured.

The above mentioned symptoms are
applicable to one form the most
common and severe, There
are other Clapit in which the
symptoms are much milder
and where many are not present
or noticeable. So mild have been
the attacks that the patient himself

exhibits a consciousness of it, by an attempt to conceal it. Some authors make a distinction in the two classes by name; they call the milder form "Petit mal," and the severer "Grand mal." Some think these are different diseases, while others affirm they are the same, but between the two extremes they make various gradations consequently a correct definition of the disease is very difficult, and these grounds we account for the variety of definitions it received both by ancient and modern writers. The aetiotic phenomena which morbid anatomist have made are very few, yet it has been noticed by some pathologists. That portion of the brain known by the name of "Cerebellum," is much more frequently found diseased than the one known as

exhibits a :

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the "cerebrum." They also discovered that those small soft glands known as "Pineal," glands are often found in a morbid state, tumors and other structural derangement are sometimes found in the substance of the brain, and at times deposits of matter have been discovered between the different lobes of the "cerebellum," with slight destruction of the substance of the brain itself and in many instances not the slightest trace of organic disorder has been discovered, either in the brain or spinal marrow, such are the morbid appearances that have been found in the inspection of the brain of "Epileptics."

Predisposing Causes

These are sometimes constitutional, and some authors say

even hereditary. The attacks are mostly about the age of "puberty".

Exciting Causes

Of these there are two classes, first, those which act directly on the brain and under such condition, we call the disease "idopathic", while then an others which act on remote parts affecting the brain sympathetically. This constitute the "sympathetic form".

Among the causes which have been found to act directly on the brain are 1st Malformation of the skull, Dessepia boni, "Exostosis", from the internal table of the cranium, Organic derangement, vascular engorgement and effusion upon the brain, Disease of the cranial bones and of the vertebra, Tumors of the head and spine, Dessepions of the internal

Table from external injuries, offshoot
deposition in the brain or its tumors,
Oppression of its arteries, metastasis
of "gout," or rheumatism to the "encephalon"
which are some of the direct causes
which may act on the organization
and cause these epilepsies. Next, of
the symptomatic type the causes are
equally as numerous, as in the
former case. Among the most
common are catarrhal irritation,
obstruction, in females, suppression of the
catamenia, sudden dying up of veins,
ipsus, cutaneous diseases, various poi-
sonous, habitual intemperance, urinary
calculi, terror, anger, grief, and often
the diurnal of person affected with the
disease.

Diagnosis

This disease is very often
complicated with "lystrix," but there

are certain symptoms which enable us to distinguish with certainty this disease from hysteria, and there is no foaming at the mouth, nor is the countenance so livid and distorted as in epilepsy. The hysterical paroxysm does not terminate in heavy sleep, as does the epileptic. In "hysteria" there are what is called "Globus Hystericus," involuntary laughing or weeping.

Prognosis

This disease seldom takes life during the paroxysm. The idiopathic form is most sure to lead to insanity. The sympathetic is frequently cured, particularly in young persons, and the more frequently the more frequently the occurrence of these paroxysms the more difficult is the disease to cure. Prognosis depends much upon the exciting cause.

It is said cases produced by falls are
hardly curable, From childhood
to Puberty is the most favorable period
It is more unfavorable when the
precursory symptoms consist of some
affection in the head, than when they
are felt in other parts; particularly
in the extremities, Protracted sleep and
stupor are unfavorable indications

Treatment

The causes of this disease
are so various that there is no exclu-
sive course of treatment applicable to it,
hence before prescription, it is necessary that
we enquire after its original exciting
cause, consider the state of all the func-
tions or organizations, which can have any
bearing upon the disease, its duration,
the time and manner of its first
attack, The constitutional habits, age
concomitant diseases, pursuits

Temper, mode of living, all these should be considered well, for it is ^{on them} a rational treatment can ^{be} founded. The treatment of this disease divides itself into two divisions viz; "Palliative and Curative". The former is applicable to the paroxysm, the latter to the interval between. In the first attack of epilepsy, the patient being ignorant of the premonitory symptoms of the disease, knows ^{not} what precaution to use, or what to do to avoid the attack, consequently the first division viz; the palliative, is commenced, while the patient is in the paroxysm and at this time but little treatment is demanded or can be given. When the paroxysm comes on the friend should be placed in a recumbent position, with the head somewhat elevated, all the tight parts

of the chf. should be loosened, especially, around the neck and chest, and also each portion that compresses the blood-vessels. The patient should have access to fresh and pure air, a soft piece of wood or some other substance should be placed between the teeth, to prevent injury to the tongue, and convulsive movements restrained so far as to guard the patient from injury. Sometimes when the patient is of full habit, bleeding is often highly recommended to lessen the metematerial, determination to the head, cold application to the head, "Sinaپins," to the extremities have been thought to be beneficial. No treatment has yet been found that will materially mitigate or shorten the convulsions. Repetition of depletory measures have

been thought, ~~it~~ ^{to} be very injurious
by deteriorating the general health.
If congestion of the brain is so
great, as to threaten apoplexy, blood-
letting, cold application to the head,
rubefacient, and warm baths to
the extremities, are all of the high-
est importance, various "enamata,"
and emetics have been used with
great effect. In cases of suspended
respiration, the electro-magnetic
current and artificial respiration
should be had recourse to. After the
patient has had several of these parox-
ysms, he can tell from the former
of these symptoms that he is soon to
be in like manner affected, and phar-
macists have recommended a treat-
ment to prevent the paroxysm, such
a treatment consists of drunks of
cold water, or brisk cathartics or

eructs, a ligature or bandaged around the limb from which the "air," seems to come. The treatment has proved very effective in warding off paroxysm in such cases as are thought to continue from habit after the exciting cause has been removed.

The radical cure of this disease is to be attempted during the interval between the paroxysms, ^{1st} where the exciting cause can be ascertained, and is of a nature capable of being removed. The exciting cause should be removed immediately as the first and most important step towards the cure. The causes which excite epileptic paroxysms, are so multiplied that we will not undertake to mention them here, but will lay ^{it} down in an invisible rule, ^{2d} with the exciting ^{cause} &

if possible, remove all sources of irritation to the brain or spinal marrow.

The "Therapeutic" agents are as various as the exciting causes, and must therefore be used accordingly. If the malady is brought about by worms in the intestinal canal as is often the case with children, "anthelmintics" will be indicated. When from suppressed peristaltic action "Siaaphorates" should be employed. When from the dying off of old ulcers vesicatory, pustulating applications, warm baths, friction &c. When from Menstrual irregularities means must be employed to abate the morbid determination to the uterine system. When from external injuries a surgical operation is perhaps the only means of effecting relief. After the removal of the exciting cause, we should enquire into the condition of every function within the organism, ascertain every enlargement and evince'd. If the blood vessels are

too full and the blood too rich, give saline cathartics, vegetable diets, with proper exercise. If "anemic", correct the abnormal condition of the blood, and in short see that every function performs its duty. In conclusion no one course of treatment, is considered as reliable, because of the variety of causes which produce it, but each must be treated with reference to its cause, and therefore we forbear mentioning the long list of remedies which have proved of great avail in the treatment of this disease. In view of the rapid advancements in medical science, we may fondly cherish the hope that the day will soon dawn when this "hell disease," which so alarmed and tormented alike the "grace conscript fathers," and the "base plebeian of Rome, despising ~~despising~~ their political upstartings, ominous of the dead revenge justice of some offended God, and with whom excommunicating ~~granted~~ the mighty Caesar shook & weakened, while the Roman eagles with every vice actions and continuous blow after blow upon his frame until beneath

Bentus. blado he had at the base of
Pompeys Statues. like Caesar. like Rome
and Roman eagles be numbered among the
things that were.