not been for statistics. Other equally apposite instances might be drawn from the above tables, and the legitimate deductions which they furnish; and I shall avail myself of some of these in elucidation of certain points in a future paper. But this one is, I think, sufficient to obtain the admission that these statistics, although imperfect, have a positive value; and I may add, that they will be found to possess a highly important relative value, when employed to counteract hasty generalisation, from statistical data, more accurate in themselves, but upon too limited a scale.

Adverting, then, to another statistical fact, the apparent increased duration of life among soldiers discharged the service for consumption, as compared with the duration of life among those remaining in the service, and the explanations of that fact by Colonel Tulloch and Dr. Balfour, referring it to fraud, malingering, and errors of diagnosis,—is not another, and a more satisfactory explanation admissible? Is it not possible that some of these men, actually affected with phthisis, recover after their discharge from military service and military regimen; or, that the disease is for a longer or shorter time arrested? Precisely analogous circumstances occur in relation to prisoners and prison discipline. Dr. Baly found the mortality from consumption during one year, in the Millbank Penitentiary, nearly four times more than the mortality from the same disease in the metropolis; and among a population of 76,535 prisoners, in the prisons and penitentiaries of various countries, he found the deaths from phthisis 1 in 118.7 of the whole number living, and 1 in 2.9 of the deaths.* But Dr. Baly states that "Prisoners who are even in an advanced stage of consumption, and who in the infirmary were gradually and rapidly getting worse, on release from confinement immediately improved." The true causes of this improvement after release from imprisonment, or discharge from military service, are as interesting and important a practical question, as the causes of the production of tuberculosis, and their *modus operandi* during imprisonment.

The statistical information before us, as to the present prevalence of phthisis both in the civil and in the military populations of this kingdom, leads me to conclude this paper with another remark, which must have occurred to many readers. Considering the high opinions for some time past entertained of the curative powers of cod liver oil, which has now been several years in general use, it must be admitted that the ultimate results are by no means encouraging. The comparison between the years 1851 and 1852, exhibits but a very trifling amelioration. Nor is there reason to be much better satisfied with these gross results, when we trace the disease back chronologically to a period previous to the introduction of the remedy; for, although, in 1841, the proportion of deaths to the population, from the four forms in the aggregate, and from phthisis in particular, was considerably greater, yet the amelioration observable cannot be attributed to this remedy alone, which has been in general use only during the last few years; and in 1850, the fatality was proportionately less than during either of the two subsequent years. So, also, we find, by comparing the statistics in Colonel Tulloch's recent and former reports, that during the last ten years, no decided amelioration appears, either in the frequency or the fatality of this disease. Our disappointment at this result is the greater, inasmuch as the statistical records of Philadelphia indicate a very great diminution of deaths from phthisis during the years 1850 and 1851, which Dr. Wood, in his work on the Practice of Physic, recently published, has attributed to the general use of the oil. For my own part, I am not in the slightest degree shaken in my opinion of the value of the oil, notwithstanding its manifest general failure as regards a cure. As stated more fully in my work, I have always regarded it as an auxiliary to a rational system of therapeutical indications; and I still fear, that we are deprived of the full measure of its beneficial

agency, by its employment, too frequently, on the empirical principle.

The statistics of tuberculosis in the troops serving in the Mediterranean and British America, during the last ten years, will form the subject of a future communication.

3, Norfolk Crescent, Hyde Park, Sept. 1853.

ACCOUNT OF THE YELLOW FEVER OF ANTIGUA, AS IT PREVAILED IN 1853.

By THOMAS NICHOLSON, M.D.

[The following paper was received by us subsequent to the publication of Dr. Nicholson's paper, at p. 807 of our number for September 16th. EDITOR.]

YELLOW FEVER broke out in Antigua on the 15th of May, 1853,* in the person of a delicate female, a native of Scotland, who had been only eighteen months or two years in the island. This case was reported to me by an express from my son, when I was at St. Kitt's, whither I had gone for change of air, having suffered for some months from a severe attack of acute rheumatism. No other case occurred for several days; but when I arrived, on June 3rd, I learnt that my son had two other cases on his list; one, a young Scotchman, who resided not many yards from the house in which the first case occurred; the other, an army surgeon, living in another part of the city. Both these proved fatal on the fifth day, with black vomit. Cases were now added daily to the list till the end of July, our last case having proved fatal on the 31st of that month.

The following table contains an abstract of all the cases which I attended myself, or with my son, exclusive of those I saw in consultation with other medical men:—

Race.		Recovered.	Died.	Total.
Europeans	Adults	23	9	32
White Creoles	Adults	3	0	3
"	Children	6	2	8
Mixed race	Adults	0	0	0
"	Children	5	1	6
American		1	0	1
Portuguese		2	1	3
		40	13	53

The type of this epidemic, in all cases that came under my observation, was certainly that of the *ardent* form. I did not meet with a single case of the *apyretic* or *congestive* type, such as I have witnessed in former epidemics. The patient was most frequently seized in the morning. No decided rigor was observed, but he awoke with a feeling of having slept heavily, as if from a narcotic. This was immediately followed by intense headache and pain in the back; the vessels of the conjunctiva became injected and red; the force and velocity of the pulse great; and the heat of the surface pungent. At this period, the tongue presented an unusual appearance. About the third day, the febrile heat subsided; the cheeks, which had been of a florid red colour, assumed a darker hue; the lips were red, and the gums spongy and very vascular; the hands and nails became livid, and, when pressed upon, it was long before the blood returned to the cutaneous vessels. By-and-bye, a yellow tinge was perceptible on the conjunctiva, and on each side of the nose, which spread gradually over the neck and chest. Hæmorrhage from the nose and mouth now took place; flatulency was very distressing; and the vomiting, which was distressing from the first, now became more urgent, and, in the fatal cases, the matter ejected was mixed with dark flakes, like the lees of port wine, which gradually became blacker and more copious till death closed the scene. In those cases which terminated favourably, the discharges from the bowels were copious, and of the darkest sap-green; and the urine was abundant, and of a good colour. In fatal cases, the motions had not the

* Medico-Chirurgical Transactions, vol. x.

† On Tuberculosis, p. 483.

* May is usually the hottest month in the year.

slightest tinge of green or yellow; and they exhaled an offensive odour like putrid albumen. In those cases, the urine was frequently suppressed, and symptoms of *uræmia* were more or less apparent.

None of the cases in my own practice presented unequivocal marks of *petechiæ*; but a military officer, under the care of Dr. Furlonge, was spotted like a leopard from head to foot: even the mucous membrane of the mouth exhibited the same symptoms of extravasation.

Death occurred most frequently on the fifth day: one died on the fourth day, two on the sixth, and one on the seventh day. In those cases in which the urinary secretion was not suspended, death took place by *asthenia*; the patient retaining his intellect till the last. When *uræmia* existed, convulsions and coma preceded death.

From a variety of causes, no *post mortem* examinations were made.

TREATMENT. When I arrived, I found the lancet had not been used in any case; but purgatives, and five grain doses of quinine, frequently repeated, with the usual auxiliaries, were chiefly confided in. The quinine so administered appeared to me to be decidedly injurious, and it was abandoned.

In simple cases, where there was no symptom of local congestion or inflammation, purgatives of calomel, colocynt, and jalap, saline refrigerants, and effervescing draughts, formed the chief medicinal treatment. In more severe cases, five grains of calomel were interposed every two hours. The cold douche was always most agreeable to the patient, and was constantly had recourse to in the first stage. When the headache continued beyond the second day, blisters were applied to the neck or forehead with good effect.

In all cases in which at my first visit there were symptoms of cerebral or hepatic congestion, or when the force of the circulation was so great as to threaten destruction to the capillary system, I had recourse to blood-letting; and, if we may judge of the propriety of the operation by the rules laid down by Dr. Marshall Hall, we must decide in its favour, although it did not always cure the disease. The loss of blood was well borne in every case. In one patient only was syncope induced, after the loss of twenty-four ounces, and he rapidly recovered. In all the other cases a much larger quantity of blood was drawn, whilst the patient was in the sitting posture, and syncope did not occur. The effect produced was vomiting, copious perspiration, bleaching of the eyes, and relief of the headache. When permanent reduction of the pulse followed these effects, the case invariably did well; but when the velocity of the pulse continued, the case proved a bad one, and, in my opinion, would have resisted every kind of treatment.

To prove that blood-letting did not do harm, I would mention that it was had recourse to only in the worst cases, and yet not one of these died before the fifth day, whilst two of them lived till the sixth, and one till the seventh day. Of twelve cases in which the lancet was used, six recovered, and six died. In no case was the operation repeated; and it is a question whether the advocates of this practice would not have deemed it right to repeat the operation at a short interval, when the pulse continued quick. But the prejudice which has been excited by modern writers against large detractions of blood in fevers deterred me.

Having lost in succession four cases in which blood-letting was performed, either by myself or in my presence, with all the immediate effects which follow a successful operation, I considered that I was then bound conscientiously to try the empirical or abortive treatment, with large doses of quinine and calomel, as recommended by Dr. Blair of Demarara. The first case that occurred for this trial was that of a young Scotchman, who had recently come to the island. The second dose produced great congestion of the brain, and a stupor from which he could scarcely be roused, and he died on the fourth day. Nevertheless, our next case was treated in the same way, with twenty grains of calomel and twenty-four grains of quinine. Great drowsiness was the immediate result, and we were deterred from continuing the

practice. We resumed our former mode of treatment, and the patient recovered.

It is unnecessary to enter upon the treatment that was pursued after hæmorrhages and black vomit occurred; for I have no confidence then in any medicinal astringent, or in anything but the most diligent exhibition of diffusible stimulants. Patients have sometimes recovered after all hope was abandoned. This was the case with two seamen, who were landed here from a ship bound from St. Thomas to Barbadoes. They were in the last stage of the disease, with hæmorrhages from the nose, mouth, and anus, and black vomit, when admitted into the Infirmary. Sulphate of alum with quinine, tannic acid, and acetate of lead, were successively prescribed; but I discovered that they took nothing freely except their wine.

PERISCOPIC REVIEW.

SURGERY.

SUCCESSFUL CASES OF OPERATION ON THE BONES OF THE FACE.

In the periodicals of the current year, we have met with accounts of two remarkable successful operations on the bones of the face.

The first case occurred in the practice of Dr. B. LANGENBECK of Berlin. It is reported in the *Deutsche Klinik* for 30th April, 1853.

CASE I. MEDULLARY CARCINOMA OF THE UPPER JAW; EXCISION OF THE WHOLE OF THE LEFT UPPER JAW BONE, AND NEARLY ALL THE RIGHT; ALSO OF THE LEFT NASAL BONE, AND OF THE ETHMOID BONE: RECOVERY. A. J., aged 19, an unmarried female, was admitted into hospital on February 17th. With the exception of repeated attacks of intermittent fever, the patient had enjoyed good health. No hereditary predisposition to carcinoma had appeared in her family. In the summer of 1852, she felt a violent pain in the teeth and ear on the left side, and perceived that the left nostril was less permeable to air than usual. At Michaelmas of the same year, she was seized with pains in the forehead; and some time afterwards, a swelling was noticed in the left nostril. This became conspicuous under the skin of the cheek, extending outwards from the *ala nasi*; and from this time it rapidly increased in size. In the right half of the nose, a similar but much smaller tumour appeared, some weeks before the admission of the patient into hospital; this had been preceded by obstruction of the nostril, and by pain in the teeth and right upper maxillary bone. At the end of January, the tumour arrived at the surface by a perforation of the upper lip, in a direction downwards and outwards from the left nostril.

On examination, there was found in the region of the left superior maxillary bone a tumour of about the size of a moderately large orange. It was covered at the centre by a red skin, and presented, at the part above referred to, a perforation in the upper lip; while it was also visible through the expanded left nostril. In the neighbourhood of the tumour, which was scarcely sensible to pressure, there was an oedematous swelling of the face, painful to the touch, and most conspicuous at the inner angle of the left eye. On the right side there was a smaller swelling, more easily felt than seen; it seemed to occupy a large part of the nostril, so that the finger could be introduced only with difficulty. On this side, there was oedematous swelling of the inner angle of the eye and the lower eyelid; but nothing abnormal was perceived in the nasal bones. On examining the mouth, the whole of the left side of the upper lip, beyond the middle line, as far as the right *ala nasi*, was occupied by the tumour, which was pressed on by the incisor and first molar teeth in the left upper jaw-bone on the inside, and by the skin of the upper lip in front. A part of the tumour, in the neighbourhood of the teeth, was covered with ulcerative exudation. Almost the entire extent of the hard palate, especially at its anterior part, was a very irregular projection of the mucous membrane, caused by pressure from above downwards of the tumour, which flattened the arch of the palate. In it were several ulcerated spots, into which a probe could be passed for some distance, especially on the left side. On this side the tumour extended as far back as the molar teeth; and four weeks