

AN ACCOUNT
OF THE
ORIGIN AND PROGRESS
OF THE
P L A G U E
IN THE
ISLAND OF MALTA,
IN THE YEAR 1813.

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COMMUNICATED BY


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Read April 11, 1815.

THE following communication has two objects in view; first, to give a faithful narrative of the introduction and progress of the Plague at Malta, in the year 1813; and, secondly, to ascertain from induction of facts, the laws of pestilential contagion, so as to direct us in the employment of preservative means; but particularly as relates to the construction of lazarets, and to the admission of people, known to be infected, within our ports.

Towards the accomplishment of these two ends, the most prominent circumstances that occurred during the pestilential season are selected, while the principal proclamations and other public documents are given without comments, that the facts themselves may be seen without the colouring which they might receive from argument.

Lastly, my opinions and reasonings are deduced from these facts, referring to them as occasion requires, as well as from collateral evidence which I have collected in the course of my reading. If these opinions are at variance with the opinions of others, and particularly of those who had the immediate management of the disorder, it is by no means intended to impute to them any blame or neglect whatsoever. On the contrary, the zeal and exertions of those praiseworthy individuals, on so trying an occasion, merit the warmest gratitude of the surviving population. I do not believe, as it will be seen, that the plague found its way into the island and spread itself from want of exertion on the part of Government, or of the department of health; for almost every human means were put in force in conformity with the popular doctrine of pestilential contagion; but the grand and fundamental error, I believe, was wholly and solely in the doctrine itself.



Narrative of the Plague at Malta, in the year 1813.

On the 29th of March, a vessel called the San Niccolo, arrived at Malta from Alexandria, in Egypt; the master of which informed the officers of health, as he came into port, that he believed the ship was infected with plague, having lost two men during the voyage of what he strongly suspected to have been that disorder, particularly as it was raging at Alexandria, when he left that place. One of the men, he said, had a black tumour upon his neck, to which he himself had applied poultices. He also added, that as soon as the two men died, he immediately suspected the nature of their disease; and, by way of precaution, ordered the hatches of the ship to be closed, and kept the men on deck. This happened about a week previous to his arrival in Malta; and during the interval they had eaten nothing but a few biscuits that happened to be left on deck.

The master and surviving part of the crew, being apparently healthy, were permitted to disembark in the lazaret; not, however, before they had taken the usual precautions of shaving their heads, washing themselves with sea-water, and afterwards with vinegar, and of leaving their clothes behind them in the ship.

As the crew consisted of men of different nations, they were divided into companies accordingly, each company being provided with two apartments in the lazaret: and, as the captain and his servant were both Maltese, they lived together.

The whole continued, in appearance, to enjoy the most perfect health till the first of April, when on the afternoon of that day, the captain, while playing at ball, was suddenly seized with headach, giddiness, and other symptoms of plague; and he died in the course of about thirty-six hours. His servant, who had also assisted the sick men, on board, was seized about the same time with similar symptoms, and he died after a like interval. They were both buried in the lazaret.

While these things occurred on shore, the usual precautions with regard to the ship were not neglected. She had remained in the middle of the quarantine harbour from the time of her arrival, with two guard-boats stationed near her, to prevent every kind of communication; and she continued in this situation near a fortnight, at the end of which time, a number of men were hired, for a considerable sum, to conduct her back to Alexandria.

The ship and the whole of these men arrived safe in Alexandria, and the cargo was afterwards

taken out without a single individual being infected, as appears by the following letters from the British consul at that place, addressed to Lieutenant-General Oakes, the King's commissioner at Malta.

(TRANSLATION, No. 1.)

“ May it please your Excellency,

“ It is with the greatest satisfaction I have the honour to inform you of the safe arrival here on the 4th of May, of the brigantine, S. Niccolo, Captain Alexander Scarneo. Besides the crew are all in perfect health.

“ As no quarantine is observed at this place, the crew had permission to leave the vessel whenever they pleased. As to the disposal of the cargo, we are in daily expectation of an order from his Highness the Viceroy.”

May 8th, 1813.

(No. 2.)

“ In addition to what I had the honour to communicate to your Excellency on the 8th of May, by his Majesty's sloop, Badger, respecting the brigantine, S. Niccolo, commanded by Alexander Scarneo, I have now to inform your Excellency, that the brigantine has been entirely unloaded, and that the clothing, bedding, &c. have been disembarked, and that I ordered the vessel to be ventilated, washed, fumigated, and white-washed throughout every part; to be painted without, and the

sails and rigging to be washed, and the seams pitched. I have the pleasure to add, that no person employed in unloading the brigantine has been attacked with plague, and that this disease has almost entirely disappeared here."

(Signed) STEFANO MALTAS,
British Consul.

June 1st, 1813.

As the survivors of the original crew continued healthy in the lazaret of Malta, and as the dreaded ship no longer remained in the harbour, the deluded inhabitants began to congratulate themselves on their supposed happy escape.

But, on the 19th of April, a Maltese physician, Dr. Gravagna, being called to visit a child of the name of Borg in *Strada S. Paolo*, found it in a dying state, of what he then believed to be a typhous fever; he observed a carbuncle on its breast; but as this was small, and as the family were subject to cutaneous disorders, the real nature of the disease was not suspected. The child had been ill five or six days.

On the 1st of May, the same physician was again called to see the mother of this child, whom he found affected with fever, accompanied by a painful tumour in the superior inguinal glands. On the 3d, she was delivered of a child of seven months, which died as soon as it came into the world. In

the course of the same day, another tumour of an inflammatory nature was perceived in the glands of the other groin of the mother, and she died before the next morning.

During the sickness of the mother, another child was attacked with fever, which however did not prove mortal.

The father of this unfortunate family, Salvator Borg, had not long to bewail the loss of his wife and infant, before he himself was threatened with a similar fate. On the morning of the 4th, he was attacked with fever, accompanied with glandular swellings in the axilla and groin.

Dr. Gravagna, being now no longer in doubt as to the nature of the disease, related every thing that had happened to the deputation of health. On hearing the account, they immediately ordered that not only Borg's family, but every individual proved to have had the least communication with it, should be instantly removed to the lazaret; and this order was executed with the greatest care and industry.

The following notification was then issued to the inhabitants.

(TRANSLATION.)

“ His Excellency the King's civil commissioner, being informed by the committee of health, that two individuals inhabiting the house, No. 227,

Strada S. Paolo, in this city of Valetta, have, during a disease that terminated fatally, exhibited strong symptoms of plague; and that another individual of the same family has been attacked with a disease similar in its symptoms, has judged it essentially necessary, that, besides the removal of the diseased and of all those who had had too much communication with the family, to the lazaret, the following measures of precaution, and other measures of the said committee, are to be put in execution.

“ 1. That, during the present state of anxiety and uncertainty, the departure of all ships shall be suspended.

“ 2. That with a view of securing as much as possible the public health, till the real existence of the threatened malady be ascertained, the courts of justice, the theatre, and other places of great assemblage shall be shut; and that, at the same time, the business of the respective offices of government shall be restricted, as far as may be consistent with the exigencies of the public service.

“ 3. That the city and all its suburbs, as also Victorioso, Senglia, and Conspicua, shall be immediately placed under the inspection of physicians, who, together with other inhabitants of respectability, shall make daily visits to their respective districts; and report the result of their observations to the committee of health for their information.

“ Further regulations will be published from time to time through the medium of the magistrate of police, as may be most expedient. In the mean time, his Excellency thinks proper to observe, that the committee of merchants have, by way of precaution, adopted various wise and praiseworthy regulations to be observed amongst themselves.

“ While his Excellency thus fulfils the sacred duty of enjoining the proper observance of these precautionary measures, it is with particular satisfaction that he is able to communicate to the public the following extract of the report, that has been just sent to him from the committee of health, by means of which, the public will be made acquainted with the result of the information received from every district.

(EXTRACT OF THE REPORT.)

“ ‘ The committee of health at its present meeting, observes with pleasure, that from the reports they have received from the different physicians and surgeons, both civil and military, it appears that the city is at present totally free from every species of contagious disease, with the exception of the family of the shoemaker, Salvator Borg, (who is now transported to the lazaret) with regard to which the committee sees no reason to diminish its suspicions.’

‘ *May 5th, 1813.*’

“ The King’s civil commissioner believes it necessary, in such a conjuncture, to assure the public that every vigilance and authority, that a tender regard for the welfare of the population can suggest, will be called forth by himself and every other functionary of government; and while he anxiously expects that every member of society will wish to come forward in his respective line of life, and freely give his assistance, he humbly confides in the goodness of Divine Providence, that an exemption from one of the greatest of human calamities may be obtained.”

“ *May 5th, 1813.*”

On the 6th of May, a gentleman, named Delicata, went to see an old woman, who was his relation, residing in Strada S. Ursolo, and who had performed the office of midwife to Mrs. Borg. After knocking at the door several times without gaining admittance, he forced it open, and saw the old woman kneeling at her bed-side, as if at prayer. Seeing she did not move, he took hold of her and shook her, but, to his great surprise, he perceived she was dead. He instantly ran to the committee of health to inform them of the circumstance, when instead of permitting him to return home, they sent him to the lazaret, and by this prompt measure they probably saved his wife and family; for, on the 17th, he was seized with plague, and died in the course of twenty-four hours.

Notwithstanding the sudden death of this old woman, whose name was Agius, that of a young woman in the Maltese hospital, who was said to have been burnt to prevent investigation, and the sickening of a boy called Briffa, who lived at Slienca, and whose father shortly afterwards fell a sacrifice to the plague, the reports of the medical practitioners, who examined the bodies, continued to announce the non-existence of pestilential symptoms.

On the 7th of May, the *luogotenenti* (magistrates) of the districts, and others appointed to make inspections, were incorporated with the committee of health, to further their operations, as organs of communication between them and the people. The dogs and cats were ordered to be kept within doors, and people belonging to ships were commanded to remain on board, except where they should have occasion to go for provisions to a place appointed for the purpose. The people were recommended to avoid crowding together, and to keep at home as much as possible; to keep their houses and every thing about them clean. The selling of clothes, skins, &c. in the streets was prohibited, and mendicants were prevented from going about.

On the 8th of May, the committee announced the death of the boy Briffa. They also announced the death of another boy called Falzor, who lived

at No. 150, Strada S. Paolo. The fever of which he died, however, was accounted for from his having fallen into the sea. Although no marks of pestilence could be found upon the bodies of these two boys after death, it is extremely probable that both died of plague; for the father of the first died of this disease in the lazaret shortly afterwards, while five of the family belonging to the latter were attacked with it in succession.

On the 9th the committee announced the death of Borg's father, a man eighty years of age; also that of a febrile patient on the road from Taraxien to the lazaret. They likewise mentioned the discovery of a boy on the Marina Stairs, who had been attacked with a large scirrhus tumour under the pectoral muscle; but in none of these were the marks of pestilence discovered.

On the 10th they recommended the punctual continuance of domiciliary visits in every part of Valetta and the villages. They also recommended the respectable inhabitants, who occupied the higher apartments, to watch over the health of those beneath them; and that a general purification of all the houses in the island should be immediately commenced, while the old and useless clothing should be burnt.

On the morning of the 12th of May, Salvador Borg expired, and on his body being examined on

the following morning, the examiners pronounced that the symptoms under which he laboured were *pestilential* and *contagious*.

The general report, however, of the physicians continued favourable. The committee renewed their solicitations with regard to the inhabitants keeping themselves and their children within doors, recommending at the same time, that families should employ people from without to procure the necessaries of life, which should be received in a pail of water; that money should be received in vinegar; that papers should be smoked, and that the linen should be washed in the house.

The report of the 14th stated that another son of Salvator Borg, two years of age, had been taken ill with two furuncles attended with slight fever, but that he was cheerful and took nourishment; that two Greeks, who had assisted Salvator Borg, continued in perfect health; and that the medical reports stated, that no other case worth notice had happened in the whole island.

The medical report of the 13th was favourable; but a girl named Grazia Pisani, who had been accustomed to sleep in the house of Maria Agius, and who was carried to Fort Manuel on the 8th, in consequence of being a little feverish, shewed some indications of an affection of the glandular system.

Hitherto the committee of health seems to have believed that the disease was completely in their power, and that the only seeds which had taken root were securely shut up within the ramparts of Fort Manuel and the lazaret. But on the morning of the 16th, the town, as well as the committee, was electrified by its being proclaimed that the daughter of a baker, called Stellini, No. 92, Strada S. Cristoforo, had died of plague, and that another of his sons was moribund. They had both been labouring under fever from the 14th. On the same day they also found a Greek who had died of the same distemper, and that four other persons were then labouring under similar symptoms.

The committee of health observing the disease developing itself in so many parts of the city at the same time, and foreseeing the difficulty of continuing to separate the diseased from the sound, came to the resolution of permitting the infected to remain in their respective houses, provided they were sufficiently commodious to admit of their being separated from the healthy part of the family; such houses however were to be placed under a proper guard, and kept in a rigid state of quarantine. This resolution was notified to the public on the 16th of May.

On the 17th his Excellency issued the following proclamation.

“ His Excellency the King’s civil commissioner, being informed by the committee of health, that many people, from the fear of being taken to the lazaret or Fort Manuel, and thus evading the advantages that would be offered to themselves as well as to society in general, hide from the deputies of the districts and every one else the diseases with which they become affected ; by which means every one must know how much mischief arises, not only to the sick themselves, but to the public in general, placing it out of the power of any one to render them relief, and cherishing a disease, which, when concealed, becomes infinitely more deadly. His Excellency considering further, that the orders given for employing the necessary precautions have not been properly understood and executed by all ; and considering moreover what universal prejudice to the public would naturally arise under the present circumstances from robbing suspected houses ; and, considering lastly, that it would be interesting beyond every other thing to bring to light the origin and means of introduction of the contagion, orders and commands as follows :

“ 1. That any one knowing of the disease being concealed in an individual of any family shall immediately give information to the committee of health ; and every such person so benefiting society, shall not only be rewarded, but his name shall be concealed.

“ 2. That any head of a family having individuals affected with disease must not conceal it from the deputies of districts ; and should the disease appear after the deputies have performed their visit, he must give information thereof to the committee of health, otherwise he shall be punished with death.

“ 3. That the same punishment shall be inflicted on those who shall have the audacity to steal any article, even of the smallest value, from any house or other suspected place, which are to be considered as being under the special protection of government.

“ 4. That private as well as public schools for children are forbid till further orders.

“ 5. That every person is hereby specially requested to use his best endeavours to ascertain the real cause, by means of which the contagion, that afflicts this population, was introduced ; being assured that any one, performing so interesting a service to the public, will not only be considered as deserving of his country and government, but, on satisfactory reports being given to the committee or to his Excellency, he shall receive the reward of a thousand scuders ; and if he himself be guilty of any breach of the laws of health, or an accomplice of the delinquents, or in any way connected with them whatsoever, he shall

further receive full pardon for the crime he has committed.

“ *May 17, 1813.*”

In spite of these and many other rules and regulations, the disease continued to spread itself in every part of the city, attacking principally the poor, and those inhabiting small and dirty houses. The veteran soldiers, too, who were placed at the doors of the infected houses, were frequently attacked. On the 18th, there were seven people attacked. On the 19th, three attacks and eight deaths; and on the 20th, eleven attacks and ten deaths, according to the reports.

At this time certain regulations were promulgated respecting the police. Heads of families were required to affix upon their doors the names of every person contained in the house, and to cause them to appear every day for the inspection of the deputies. And in order to prevent the people from assembling in the streets, the city was divided into eight districts, each district being provided with a market for purchasing provisions. Purchasers were also required to avoid folding their commodities in paper, and invariably to pass their money through vinegar.

Although the suspension of commercial transactions at this time was operating, on the one

hand, against the spreading of the contagion, it began to operate in its favour on the other, by depriving the poor of their daily sustenance, thereby rendering them more susceptible of the disease; a calamity that seldom fails to be added to this most lamentable of human afflictions. To obviate this evil as much as possible, a liberal subscription was set on foot by the gentry, military, and merchants, for the relief of such as were found to be in distress. Thus several thousand dollars were distributed by the deputies of the several districts at the rate of about ten pence (two taris) to each individual in distress. The number relieved in Valetta amounted to about 2100, and in Floriana to about 300.

On the 22d of May, all communication between the shipping and the shore was ordered to cease at sun-set, and the Marina gate to be shut at 8 o'clock P.M.

While his Excellency the commissioner and many other individuals were thus endeavouring, to the utmost of their power, to arrest and impede the progress of this dreadful calamity, malevolent persons were not wanting to thwart and defeat their intentions, some asserting that the disease was not the plague, while others went so far as to insinuate that the whole was a contrivance to answer certain interested ends. In consequence,

therefore, of these and similar insinuations, his Excellency published a certificate, signed by the profession of the College of Physicians and others, specifying that the existing disease was the true plague. A reward of a thousand scudes was likewise offered by him to any one who should give information against any of these offenders.

Like time itself, that steals along in spite of every human effort to prevent its progress, so the contagion, by steady and progressive steps, continued its career.

	Attacks.	Deaths.
On the 21st there were	5	6
22	5	6
23	3	4
24	3	7
25	4	4
26	10	5
27	17	5
28	10	7
29	12	16
30	15	10
31	16	10
Average from 21st to 31st,	9.5	7.4

On the 3d of June, the names of the deputies were published, in order that they might be

known to the people. They were instructed, not only to prevent communication between the different districts, but between the different families in each district. They had the power to arrest any individual who offended against their orders, and to place any house in a state of quarantine. Every species of commerce was directed to cease: carriages were to be stripped of their linings, and the infected houses were to be distinguished at night by a lanthorn hung at the doors.

On the 11th of June, another subscription was made for the purpose of purchasing new clothing for the poor, to replace that which might be required to be burnt.

The want of provisions by this time began to be felt by all classes of society, in consequence of the interrupted communication between the island and those countries from which they were previously imported. The threatened dearth, however, was timely averted by an arrangement with the Sicilian government, through the intervention of the British minister in that island. By this arrangement it was agreed, that vessels sent from Malta to a certain part of Sicily should be permitted to draw whatever provisions they required.

By the 24th of June, the disease had not only diffused itself over every part of Valetta, Floriana,

and the towns adjoining, but it had extended to many villages. All communication, therefore, between the towns and these villages was ordered to be cut off, allowing only the officers of government, and such as procured passports from government, to go through the barriers.

The disease however continued its wonted pace, and rather accelerated its steps, so that on the 29th his Excellency instituted an extraordinary commission of health, to be composed of the most able, zealous, and respectable people to be found, at which he himself presided.

The first act that proceeded from the deliberations of this body was put in force on the 3d of July, when Lieut.-Col. Rivaroli, of the Sicilian regiment, was created inspector-general of police, and invested with the power of a magistrate, independent of all others. The corps of civic guards was placed under his command, and he had the authority to call to his aid and assistance any other military force he might deem necessary.

On the 13th of this month, the communication between the different cities and suburbs was ordered to be prevented respectively, as well as between these and the rest of the country, as far as could be done compatibly with the public service, while proper barriers were established between each of these places for the purpose of transmitting provi-

sions. The number of passports was again limited ; and about this time, another subscription was made for the distressed inhabitants of Valetta.

On the 17th of July, a notification was issued to prevent any individual from moving out of doors, except from six till ten o'clock in the morning, when only one person belonging to each family should be permitted to go to market.

The end of this month arrived without bringing with it any remarkable alteration for the better ; the following decisive order was, therefore, published on the 1st of August.

“ 1. That any person changing his habitation without permission from the council of health, to whom he must first shew the approbation of the heads or deputies of the districts they leave, as well as those they wish to enter, shall be punished with death.

“ 2. That the same punishment shall be inflicted on any person who shall enter, without the proper permission, into any place infected or suspected, or who shall dare to leave them, or carry from them to another place any article however small.

“ 3. That any one who shall not reveal his complaint at the first moment, or even the slight-

est indisposition in himself or any person belonging to his family, or dependent upon him in any other way, shall suffer the like punishment of death.

“ 4. That any one who does not reveal the disease or indisposition which others go about concealing, when he shall have been convicted of having been made acquainted with it, shall be subject to the same punishment.

“ 5. That the same punishment of death shall be inflicted on any one who shall conceal, being a proprietor, or steal the least susceptible article from any infected or suspected place; or who shall permit, or not prevent, if he has it in his power, such robbing or concealing in others.

“ 6. That he shall be subject to the like punishment who, knowing that any one of the above articles 1, 2, and 5, have been transgressed, does not immediately disclose the circumstance to the department of health.”

At the earnest request and recommendation of the council of health, his Excellency also ordered that all the inhabitants of Valetta and Floriana should retire into their respective houses, with the exception of those whom the exigencies of government might require to go out, and such as might be employed to furnish provisions, or who might

be otherwise essential to the public service. The deputies of districts were required to cause provisions to be carried to the doors of the houses.

The adoption of the same measures were likewise recommended in the other towns and villages.

On the 9th of August, the inspector-general issued certain rigorous orders for the observance of the volunteer and urban guards, respecting cleanliness; directing them at the same time to keep every house in a perfect state of quarantine.

On the 17th, a man, named Antonio Borg, was shot in the street for concealing his complaint.

On the 22d of August, it was ordered that no cotton should be gathered, but that it might be made use of as pasture while the plant was yet young; and that the punishment of death should be inflicted upon any one disobeying this order.

Towards the latter end of August the disease had very sensibly decreased in Valetta; for at the beginning of the month the deaths had amounted to about twenty-five per day, whereas now they did not exceed five or six. In Floriana it had decreased nearly in the same proportion; but it seemed rather to increase in some of the villages, particularly those of Zebbug, Bicchicara, and Curmi.

In order to extinguish, if possible, the remaining embers of the contagion in Valetta and Floriana, his Excellency, by a proclamation dated the 29th of August, cut off the communication entirely between these two places respectively, and between them and the country, not permitting even vegetables to be received at the barriers.

While the disease was gradually ceasing in Valetta and Floriana, (few being attacked besides expurgators, guards, and such as were particularly exposed to the contagion,) it still continued its depredations in the country, and particularly at the villages above mentioned. With a view to stop its progress there, his Excellency, on the 11th of September, caused a cordon of troops to be stationed around the three villages, intercepting the communication between each other at the same time.

About this period the village of Seggieni became infected for the first time, when eight or nine persons living near each other fell sacrifices to the disease.

Towards the middle of September the contagion appeared to revive in Valetta district, No. 8, where several of the guards and others were attacked. Particular attention was therefore bestowed upon this district. The progress of the contagion was attempted to be traced amongst those who became

infected, and it was explained to me in the following manner by the deputy of that district.

On the 25th of August, Andrea Xibbecas, who lived at Strada S. Giuseppe, received a will from his mother who was then infected with plague. On the following day he himself was attacked and died.

On the 6th of September, a boy named Luigi Cessal died suddenly; but no communication was traced between him and Xibbecas.

On the same day the daughter of Vincenza Psaila died suddenly. It appeared that her father, who was a butcher, had obtained permission from the deputy the preceding day to kill a pig at a caldron, situated at a place opposite Xibbecas' house, but no communication was traced between the butcher and Xibbecas.

On the following day (7th) G. B. Dofen was attacked at a house opposite to Cessal, and it was found that the former had received two eggs from the hands of the latter on the 5th.

On the 11th, the wife of Psaila, who had been ill five days, died.

On the 12th the father of Cessal died.

On the 13th, a priest, who lived in the neighbourhood, sickened, and died on the 14th. This man had been in the habit of communicating with Cessal's family.

On the 16th, a surgeon, whose name was Madrenza, was attacked. He had visited Cessal the father professionally in the night of the 11th, which was the night previous to his death. The surgeon died on the 18th.

On the 18th also died Psaila the butcher, who had been attacked on the 10th, as did two of his sons, the one as he was going to the pest hospital.

While these cases happened, however, several others occurred within the district as well as out of it, amongst whom the contagion could not be traced at all.

Lieut.-General the Right Honourable Thomas Maitland having arrived at the latter end of September as future governor of Malta, Lieut.-General Oakes (now Sir Hildebrand Oakes) laid down his appointment by a proclamation dated the 4th of October.

The 3d garrison battalion, stationed at Floriana, in a barrack not more than a hundred paces from the military pest hospital, and not more than four or five hundred from the place where the sus-

pected articles were brought to be burnt, became again infected, after remaining free during the whole of the month of September. At the beginning of October, a woman of that corps was attacked with what was considered a simple fever, and she was permitted, in consequence of this opinion, to remain in the barracks during the first week of her illness; but as she became worse at the end of this period, she was removed to the regimental hospital, where she died on the 22d, without exhibiting any symptom of plague.

On the 16th, a soldier of this corps named Rotsinsky was attacked with fever, attended with bubos and other pestilential symptoms.

A soldier, of another company, was attacked on the 20th, whose name was Frayner, in a similar manner. And on the same day a boy, named Brearton, was also found to have a large tumour under the right pectoral muscle, in the exact situation of a pestilential bubo; but as this was attended with neither fever nor pain, it was gradually resolved without his suffering any inconvenience.

On the 23d, Serjeant Draper, who belonged to a different company from any of the former, was seized with fever, bubos, and other pestilential symptoms; while, on the same day, Hall, a man belonging to the same company, was found to

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have a carbuncle upon his back. This last man, having but little fever, recovered, while all the rest (except the boy) died.

On inquiry it was found that the wife of this serjeant had washed for Hall, and had kept his linen in the same drawer or box with her husband's. But she herself, although she continued to attend closely upon her husband till his death, was never infected, and she brought forth a healthy child a few days afterwards.

On or about the 23d, Samuel Ward, servant to the town-adjutant, and belonging to this regiment, was attacked with fever : but it came on one evening after much fatigue in washing the floor of his master's house without stockings or shoes, and after putting on the pantaloons, which he had washed, to dry, as is customary with soldiers. He considered the attack as a fit of the ague. A surgeon, who was sent for the next day, denominated the disease a remittent fever. On the following day several livid spots appeared upon different parts of his body, which this gentleman considered as boils. Seeing the man much worse the next day, the surgeon requested I would see him. I found him covered with pestilential carbuncles, and he died in the course of a few hours.

Although this man belonged to the garrison battalion, he had had no communication with it

for many months, further than by taking the daily report from the adjutant's orderly, by means of a pair of tongs. He lived in Valetta upon the gateway, through which all the diseased persons and suspected goods were carried from Valetta, and he was the last acknowledged case of plague that occurred in the town.

On the 19th of this month, his Excellency the Governor notified to the public, that mercantile transactions might be resumed under certain restrictions, and under the immediate observance of the council of health; and that packages would be allowed to be shipped in no other vessels than such as were bound to the Levant.

Among those attacked with plague this month, were nine sextons, seven expurgators, five guards, and four hospital servants.

At the beginning of November, they began to purify and whitewash the infected houses in Valetta with redoubled zeal, while every species of suspected furniture and clothing was consumed by fire. The expurgators and whitewashers were encamped on the outside of the walls, and whenever they made their entry into the town, they were preceded by a drum, which caused the inhabitants to retire within their respective houses, they themselves being escorted by a military guard.

On the 13th of November, a general purification was ordered to be made throughout the whole of Valetta and Floriana, when every house, magazine, ship, &c. was required to be opened and ventilated every day for the space of a fortnight. The goods contained in them were ordered to be ventilated frequently and handled by the owners. Great pains were also taken by the governor to bring to light infected goods that might be concealed. To this end, the priests and confessors were of the greatest use.

But, although Valetta, Floriana, and adjoining towns remained free from the disease, and although it had ceased in Zebbug at the latter end of November, it continued to infect the two other villages, Curmi and Bicchicara. It also re-appeared at Rabbato, and continued in it during the whole of the month of November. This place was also surrounded by a cordon, while every person attacked was immediately transported to the lazaret.

About the end of November, the disease also broke out at a place called St. George's Tower, where, in a family consisting of nine persons, seven were destroyed before the 8th of December. The father of this family, when on his death-bed, could only account for the disease by saying that he had gathered some cotton from a field of his, near Curmi, previous to the formation of the cordon; and that his wife had brought a box of fruit tied with a

cord from Rabbato, but not from an infected house.

About this time too, a woman at Nasciar, where the plague had not existed for three months, was attacked in the following manner. She was brought to bed in the beginning of December, but before she had time to recover from her indisposition, her husband compelled her to get up and wash his pantaloons. Being fatigued by the exertion, she drank a good deal of wine. This was soon followed by flooding, and that, which suddenly ceased, by a violent fever attended by a bubo in the groin, and she expired on the following day.

In this instance, the infection was accounted for in the following manner. A noted smuggler, who had been kept a long time in observation, and afterwards liberated in consequence of no marks of disease appearing upon him, had been drinking a short time before the accident with this woman's husband, when it was supposed he came in contact with the identical pantaloons the woman had washed!

But to return to the third garrison battalion which we left afflicted with plague. On the 24th of October, this regiment was removed to Fort Riccaroli, but, immediately after its arrival there, several suspicious cases occurred, such as bubos, livid sores, &c. On the 8th of November, a tailor

belonging to the regiment, whose name was Thomas Shell, was attacked with a bubo in the groin attended with violent fever, of which he died on the third day. His wife was also affected with a carbuncle on her leg, but as this was unattended with fever, she suffered but little inconvenience. Another tailor, who denied having had the least communication with the former (being of another company and working in a different part of the barracks) was attacked with fever and bubo, of which he died on the 13th.

But the most remarkable case that occurred about this time was that of a Corporal Farrell, of this regiment. This man had been standing in the sea on the 10th of November upwards of an hour to wash and purify his clothes according to an order to that effect. On coming out of the water, he was seized with violent shivering and headach, succeeded by heat of skin, and afterwards by sweating, which alleviated the distressing symptoms. On the following day, the paroxysm was repeated. He was permitted to remain in the barracks from a belief that his complaint was an intermittent fever. The next day his fever returned as usual, but now it declared itself to be the plague, by a bubo arising in the groin, while the heat of the pain seemed to be transferred suddenly from the head to that part. The paroxysm was again followed by an intermission or remission, but the next morning, while

dressing himself to go to the lazaret, he dropped down and expired.

On the 29th of this month, the council of health was dissolved.

On the 4th of December, the governor issued a proclamation, of which the following is an extract.

“ His Excellency feels great pleasure in declaring, that the foul quarantine of the cities of Valetta and Floriana having expired, the clean quarantine of these cities will commence to-morrow.

“ As long as no unforeseen accident occurs, it is the intention of his Excellency to grant, at the end of forty days, free pratique to every part of the island, with the exception of those villages in which the plague may manifest itself. In consequence of which, his Excellency is pleased to order,

“ 1. That the inhabitants may have the most free communication among themselves within their own districts.

“ 2. After the first twenty days of the clean quarantine shall have passed over, the entire cities of Valetta and Floriana shall be liberated from every restriction, but numerous crowds shall be prevent-

ed. That, during these forty days, there shall be no pass granted to go or to return from the country, except to the inspector-general, the superintendent of the lazaret, the proto-medico, the deputy-inspector of hospitals, the agent for the prisoners of war, or such officers as may have a passport directly from Government. And all these are to consider themselves as strictly obliged to answer that they have no communication whatsoever that may endanger the public safety."

Having thus notified his intention of granting pratique to the island, his Excellency also considered it his duty to publish an exposition, setting forth the grounds upon which he acted. The following is the substance of this exposition.

"It happens that more than forty days have now elapsed without a single case occurring of the least suspicion either of plague or of pestilential infection in the city of Valetta, and that the last case that occurred antecedent to these forty days, was seven days before that period: that Floriana has been thirty-eight days free from any case, or suspicion of plague: that Conspicua has been so from the 18th of July; Victorioso from the 20th of August. In Surglea there never happened but a single suspected case, and that was many months ago. The plague hospital in the port has been finally purified since the 18th of October. At Riccaroli,

the last case, or the last suspected to be the plague appeared in the third garrison battalion twenty-six days ago. It is to be observed, that this regiment has been kept in a most rigorous state of quarantine, and considered as in a lazaret since the time it left Floriana forty-two days ago.

“ In Zebbug, no case of plague or of pestilential infection has happened for fifty-six days; none at Bicchicara for thirty-three days; but, at Rabbato, a case occurred on the 26th ult. At Casal Curmi, cases are continually happening from time to time.

“ It is also to be observed with respect to these two last villages, that they are shut up in the closest manner by a cordon of troops. Casal-Curmi in particular has remained in that state for three months.

“ Nor has there been an instance in which these villages have had the least communication with others, so as to endanger the health of their neighbours, neither has there been any example of any soldier, forming the cordons, who has shewn the slightest suspicion of infection.

“ At present the cordons drawn round the two places have been doubled with respect to the number of men, while their communication with others is completely cut off.

“ It is necessary also to add, that no real case of plague has occurred from the commencement of this calamity up to the present moment on board ship; that in all the cities a complete and most perfect purification and cleansing of the goods and infected articles has taken place in every house, and an exact ventilation, purification, and handling of goods, has taken place in every house, shop, and magazine, and this has fortunately been completed without any case, or any suspicion of plague having happened.

“ The places of divine worship have also undergone a similar purification and management under the very excellent direction of Monsignor the bishop. All the papers and documents of the public notaries, &c. have also been properly fumigated.

“ *Dec. 4th, 1813.*”

“ *P. S.* Since this proclamation was put to press, a violent case of plague has happened in an entire family in the vicinity of St. George’s Town, but it has been ascertained to a certainty that the infection arose from a communication that took place with Rabbato, previous to the formation of the cordon being established in that district. It is, moreover, to be observed, that the house in which this accident occurred, is distant and absolutely isolated, and that it has been in quarantine these thirteen days.”

Another proclamation was issued on the 7th, to the following effect.

“Yesterday another pestilential case occurred at Casal Nasciar, which was found to have proceeded from a communication with the house at St. George's. It has been also discovered, that boats, either for the purpose of smuggling or refreshing, have been in the habit of frequenting St. George's Bay, when the crews occasionally disembarked, and had communication with the said house.”

About the 20th of December, the town of Valletta was again thrown into the greatest state of alarm, by the occurrence of two suspected cases, both situated not far distant from the gate leading to Florjana. The one occurred in a man about forty years of age, whose skin was covered with large and diffused black spots, as if the blood had exuded into the cellular membrane. This was attended with a sense of suffocation and blackness of the face, like a person labouring under hydrothorax. The second case occurred in an infant which had a large bubo in a mature state in the groin, attended with fever and several large livid spots upon the skin, with broad inflamed margins, resembling carbuncles. But as both these recovered without communicating the disease to others, they were not held as cases of plague. On the 24th of December, however, his Excellency, the governor, issued a proclamation, stating, “that he was happy

in having it in his power to announce that the uniform opinion of all the physicians consulted by Government, was strongly in favour of its (one only being mentioned) not being a case of plague or of pestilential contagion. Notwithstanding, however, he deemed it prudent, as a measure of precaution, to order that the opening of the communication generally between Valetta and Floriana should be postponed for some days, promising, at the same time, that he would open the general communication between all the towns on both sides of the port on the first day of the new year, if no fresh case of suspicion occurred in the mean time." He was also pleased to promulgate the following regulation, to be put in force if any other case of contagion or suspicion occurred.

(EXTRACT.)

" An appropriate proclamation shall be made by the officer of police, accompanied by a trumpet or horn through the various streets, with a view to give the people an opportunity of retiring to their respective houses. A military patrolle shall also attend to enforce due obedience to such proclamation.

" While a particular investigation shall take place in order to trace the contagion, the district in which such cases shall have happened being shut up, and the sick carried to the lazaret, a free communication shall be granted in every other dis-

trict (now divided into twenty-six) and in such manner as the nature of the case may require.”

On the 7th of January, the courts of judicature were re-opened.

The 14th of January being the day on which the period of clean quarantine had expired in Valetta, and the surrounding cities, these obtained free pratique at that time. It had also been the intention of the governor to have granted pratique to the whole of the country, except Casal Curmi, but unfortunately a case of rather sudden death occurred at Casal Nasciar on the day preceding; and, although the body did not exhibit any signs whatever of glandular enlargement, it was judged prudent to suspend the granting of pratique to the whole island for a few days longer. His Excellency therefore ordered that no communication between Valetta and the country should take place for the space of fifteen days.

Not trusting to the precautions that had been already adopted, and conceiving that there might have been persons who had concealed infected articles before death, that had hitherto evaded the vigilance of the police, his Excellency issued a proclamation, dated 25th of January, offering a handsome recompense to those who could give information of such concealed articles. At the same time, the bishop pronounced the punishment of

excommunication against every one who should keep infected goods in their possession without giving notice thereof to the Government.

The following proclamation was at length issued by the governor on the 27th of January.

“ His Excellency the Governor is at length happy in being able to announce that the general quarantine throughout every part of the island will cease on the 29th instant; that a general pratique will then be granted, and that the communication will be established everywhere.

“ In the midst of this happy occurrence, it becomes his principal duty to set forth in the most solemn manner a sentiment that ought to be universally felt, his sincere gratitude for the gracious interference of Divine Providence, for having liberated this island from the horrid calamity with which it has been so lately afflicted; a calamity whose fatal influence is generally felt to a much greater extent in other countries in which it unfortunately happens.

“ His Excellency therefore orders, that Sunday next, the 29th instant, be set apart for prayer and thanksgiving to the Almighty God. On that day divine service shall be performed in the government chapel, while the bishop shall order that the necessary measures be taken for the usual performance

of a solemn Te Deum in the several churches under his particular jurisdiction.

“ His Excellency moreover feels it his duty to express the high sentiments of esteem which he has for the general meritorious conduct of the public functionaries, during the whole of this period, in which they have sustained so lamentable trials. Nor can he omit to mention the great good sense and patient suffering that has characterized the people of this island, under circumstances so painful and afflicting.

“ His Excellency also takes advantage of this opportunity of exercising a prerogative that has been ever nearest and dearest to the heart of his Sovereign ; that is, he notifies that on the same day, necessary orders shall be given for the pardon and liberation of all the delinquents in this island, save and except those who have been condemned for murder, or for other crimes committed against society in general, so serious and black as to endanger the public safety.

“ Having thus satisfied a feeling so grateful to his mind, his Excellency referring to a proclamation of the 4th ult. and acting according to the principles therein set forth, in making known to the public the grounds upon which he acts, has now to observe, that since that period, no case of plague has occurred in Valetta, Floriana, Victori-

oso, Surglea, Conspicua, Fort Riccaroli, in the port, or on board ship; neither has there been any case of plague or of pestilential infection in all the country for fifty-four days, with the exception of the lazarets, in which isolated cases are continually occurring.

“ Given at our palace, La Valetta, this 27th day of January, 1814.

(Signed) F. LAING,
Principal Secretary of Government.”

In this way the period of plague was terminated at Malta; nor did any other decided cases occur afterwards, except in occasional instances at Casal Curmi, which was considered as a lazaret. Shortly after this period I left the island to proceed to Sicily, my proper station; but not being permitted to land there, or to perform quarantine in that island, I was obliged to return to Malta. On my relanding, I found that the disease had broken out in Gozo, where I believe it carried off sixty or eighty persons. It was said to have been conveyed thither by a man who had dug up a box near Casal Curmi, which contained articles of wearing apparel, supposed to be infected. A man indeed did go from this neighbourhood to Gozo, and was the first in that island who fell a sacrifice to the disorder; but as to his digging up a box, this was an idle report, and could not be substantiated, as I was confidently assured from the best authority.

OBSERVATIONS.

With respect to the mode in which the plague found its way into the island of Malta in the year 1813, there are a variety of opinions ; but every one of them, as far as I have heard, is founded upon the belief that it could only be communicated by actual contact either with infected persons or infected goods. Consequently, as nothing has been brought to light in proof of these conjectures, it is still almost universally believed that it was brought by some clandestine intercourse that never was revealed.

As its introduction then eluded the observance of all those who were then upon the spot, and as it shunned the vigilance of a most active government, in a situation too of all others the best calculated to favour detection, it may be considered presumption in me, who was not present at that time, to take upon me to resolve the difficulty.

But my opinions do not rest upon the evidence that, of necessity, must have been indirectly obtained. They are founded rather upon the want of evidence which the government of Malta experienced in wishing to bring the matter to light.

From the days of Hippocrates to the time of

the illustrious Sydenham and even later*, the pestilential influence was considered as capable of being conveyed through the medium of the atmosphere; but more recently, for reasons, I should suppose, more novel and convenient than demonstrative, this doctrine has been completely changed; and now, although the atmospheric influence is not denied with respect to many other diseases, as small-pox, measles, &c. it is altogether exploded as being capable of conveying the contagion of plague. Nay, to so great perfection has our knowledge of this particular contagion been reduced, that the distance of its influence has been measured, while the articles of commerce have been marked with their several degrees of susceptibility in retaining and parting with the poison†; it is lamentably proved, however, that our knowledge of these matters is still imperfect from our constant failure in the management of this contagion.

It is very remarkable that whenever a subject becomes so interesting as to draw to it the consideration of the public, if it is not already perfectly clear and comprehensible in itself, they will soon make it so: that is, if their senses cannot be brought to comprehend the subject, they will adapt the

* See Russell on the Plague, p. 261, 280, 291, and elsewhere.

† See Sir James Porter's Observations, p. 446. Muratori, lib. i. c. x. p. 84. *et aliis locis*. At Malta hot bread was held as susceptible, while cold-bread was not.

subject to their senses. Hence it happens that popular opinions on abstruse matters are generally wrong, and that popular theories very frequently fail when applied to practice. From the difficulty of comprehending the Divine Being, it has been customary in every age and nation to consider him under the form of some material object, as an ox, a man, a sheep, &c. Nay, I have frequently seen the great God represented, by vulgar artists, under the figure of an ugly old man.

This mode of exemplifying instead of demonstrating appears to have been practised by the public with respect to pestilential contagion, while they have taken the subject entirely out of the hands of those whose business it is to consider it*.

The belief that the pestilential influence cannot be transported through the medium of the atmosphere, but must necessarily rest upon some material and visible object, hereafter to be communica-

* The *Bishop* and *Governor* of Marseilles published certificates in order to prove that pestilential contagion could not spread otherwise than by contact, affirming that families which shut themselves up, and monasteries that were properly secluded, escaped during the great plague which raged at that place. (*Traité de la Peste*, p. 150, 153.) In the *Relation Historique*, however, it is stated, contrary to these assertions, that in the *height* of the pestilence the infection penetrated into places which till then had remained inaccessible; that monasteries and houses shut up in the most exact manner were no longer places of security. (p. 169.)

ted by contact alone, appears to me to be contrary to every experience and reason. Imaginary thefts and contraband transactions give wonderful facility to modern expositors of pestilential contagion; but so many frauds as are usually required are as improbable as they are unphilosophical; for they tend to defeat scientific investigation while they fail to produce conviction themselves: but to come to the point, Why do all diseases that occur during a pestilential partake of the nature of plague? “*Evenire communiter solet (pestis) quod morbosum tempore nulla præter pestes ægritudo appareat. Quod si aliæ et multiplices quidem apparuerint ægritudines, tunc pestilentia remittitur et cessat*.*” This observation appeared to me to be particularly verified at Malta during the plague of 1813. I myself saw but two cases of fever unattended with pestilential symptoms of one kind or other. One of these occurred in a woman of the 3d garrison battalion, mentioned at page 28, and the other was in a man of the 14th regiment, who died of a very anomalous kind of fever at the very termination of the season. But cases like these that are unattended with the peculiar symptoms of plague may even be of a pestilential nature, as appears by the following example related to me by Dr. Gravagni, jun. The hair-dresser of this physician was attacked with fever during the

* Ficino, cap. 4. fol. III. in principio. See also Thucydides on the War in the Morea, lib. II.

height of the plague, of which he died in the space of three days, but without exhibiting the least external symptom of plague. In a week after his death, his wife was attacked in a similar way, having no marks of plague upon her. A few days after her death, however, their child was seized with fever which was accompanied with bubos and other characteristic symptoms of the true plague. A similar instance of plague or pestilential fever occurring without external symptoms, seems to have happened in the child of Mrs. Borg, mentioned at page 8, and also in the boy named Falzon, page 11, and Grazia Pisani had been feverish a week before the glandular system became affected. These examples are sufficient to shew the folly of pronouncing these cases non-pestilential, because the peculiar characteristic symptoms happen to be wanting. The most respectable of the Maltese physicians acknowledged to me that they believed every case of fever that occurred during the season of plague was pestilential.

The general influence of the pestilential effluvi-um was also abundantly proved at Casal Curmi. This village, from its low and damp situation, is always unhealthy in the autumnal season, when the inhabitants become subject to intermittent and remittent fevers. This was so much the case indeed at one time that the grand-master Pinto ordered all the ovens for baking to be removed thither, from an idea that they would correct the

air. From this circumstance the village is frequently called Casal Pinto, or Casal *Fornaio*, the village of ovens. During the summer and autumn of 1813, however, it was entirely exempt from the autumnal or *mal-aria* fever, as it is called, while the plague committed the greatest devastation. “ Besides the common symptoms of plague, (says Parisi) such as bubos, carbuncles, and the like, it (the pestilence) had this common character, that while it continued, no other infirmity was perceived, or if any one was attacked with another complaint, it was immediately converted into this. The same thing (he adds) was observed at Trapani, my own country, in the year 1575, that for eight months successively the most vigilant physicians there were not able to distinguish any other infirmity besides the plague: and where tertians began to appear, it was an infallible sign that the plague had ceased*.”

The same general influence will be seen to have operated in a striking manner in the particular cases I have mentioned at pages 29, 32, and 33. The case which occurred in the person of Samuel Ward, was a fever contracted by his imprudently putting on wet pantaloons when fatigued. The next was in the woman at Nasciar, who got up from her child-bed to wash; and in the last example,

* Cap. iii. p. 70.

the corporal brought on his fever by remaining too long in the sea. These fevers, which at another time would probably have had no uncommon symptoms, were now modified by the general pestilential influence, and converted into the true plague. The fever which the boy Falzon contracted by falling into the sea, was probably modified in the same way.

As this is an important question, I shall mention some other examples that also fell under my own observation. A Mrs. Farrel, belonging to the Royal Artillery, was seized with fever, attended with bubos and other pestilential symptoms of which she died, on or about the 1st of September. She had been attacked while living in Fort St. Elmo amidst the men of that corps, where she had been shut up from the commencement of the plague, without the possibility of communicating with any one out of the barrack. Although this woman did not communicate the disease to her husband or child, both of whom had long and intimate connexion with her up to the day of her death, there can be no question of her disease being the plague; for besides the daily paroxysm of fever, which was accompanied with delirium and very great giddiness whenever she attempted to walk, she had first a bubo of considerable size in the seat of the upper inguinal glands on the right side; and before death, a considerable en-

largement of the lower glands on the same side appeared. In short, if this woman did not die of plague, I never saw the disease.

The next case was not considered pestilential, merely from the circumstance of its not proving contagious.

About the 20th of November, a man who lived at Pictâ was loading his cart, when he received a violent blow upon his chest from a cask of coffee falling upon him, which caused a hæmorrhage from his nose and mouth. This was succeeded by a fever of a remittent kind. Being sent to see him on the 29th, I found him in the remission of fever, but he walked like a drunken man. His body was covered over with livid blotches from the size of a pin's head to that of a split pea. He had moreover a very considerable enlargement of the parotid and sub-maxillary glands. The subsequent paroxysms of fever were attended with considerable delirium till the glands suppurred, after which the fever subsided and the man recovered.

As this case, which occurred after the foul quarantine had nearly expired, as well as the two cases mentioned at page 38, which happened during the progress of the clean quarantine, would have materially influenced the granting of pratique, had they been denominated plague cases, and as none of them proved contagious, the government was

perfectly justified in denying that they were cases of plague, although in a philosophical and medical point of view, no one could justly deny that they were all modified by the general pestilential influence. I saw and heard of many other similar cases at the decline of the pestilential season.

But fever is not the only disease that seems to be influenced by this general cause. I observed, during my residence in Malta, that every whitlow festered, and every scratch became an ugly sore, although many of these were accompanied with little or no fever. A tight shoe was sufficient to produce a livid boil with symptomatic bubo. Many cases of this nature occurred in respectable individuals and staff officers, while the military hospitals were crowded with them. As an example I shall give a list of some which occurred in the 14th regiment between the 20th June and 22d October 1813.

LIST.

Name.	Disease.
1. John Jones	Eruption and tumour in the axilla.
2. Thomas Tope	Ulcer and enlarged gland.
3. Serjeant Rees	Inflammatory swelling of the thigh.
4. James Frith	Ulcer on the leg, with enlarged gland and slight fever.
5. Richard Scott	Boil, with extensive inflammation on the arm.
6. William Bales	Boil in the axilla.
7. James Grady	Boil in the axilla.
8. John Blaky	Inflammatory tumour below the knee.

Name.	Disease.
9. James Green	Ulcer on the leg, and enlarged gland.
10. James Sapwell	Boil in the axilla (livid colour).
11. William Larton	Inflammatory tumour on the inside of the arm.
12. Robert Impy	Inflammatory tumour on the foot, and enlarged gland, with slight fever.
13. William Crawley	Erysipelatous inflammation of the foot.
14. William Tope	Inflammation of the toe with enlarged gland.
15. William Aldwood	Boil in the axilla.
16. William Savage	Inflammation of the toe, and enlarged gland.
17. Job King	Ulcer on the knee, with enlarged gland.
18. William Hays	Diffused inflammatory tumour of the thigh below Poupart's ligament.
19. Samuel Halfide	Inflammation of the toe, and enlarged gland.
20. James Nouch	Boil in the axilla.
21. James Wagstaff	Inflammatory tumour on the foot, and enlarged gland.
22. Corporal Bourie	Ulcer on the foot; and enlarged gland.
23. Corporal Walker	Ulcer on the leg, with enlarged glands and slight fever.
24. John Burns	Inflammatory tumour on the foot, with small ulcer and enlarged gland.
1. Lieutenant ———	
2. Lieutenant ———	Small livid ulcer at the first joint of the great toe, preceded by a vesicle, attended with enlarged gland.
3. Lieutenant ———	Slight wound of the knee with enlarged gland.

An equal or greater proportion of similar cases occurred in the third garrison battalion, as I had an ample opportunity of observing. Mercurialis noticed the same thing in the plague of Venice,

“ Quicumque (he says) tenebantur à principio tertiane, vel aliquo alio morbo, magna ex parte convertebantur eorum morbi in pestiferos : imo aliquos fuisse *vulneratos*, et *vulnera* illa conversa fuisse in pestem.”

If the plague were communicated by contact alone, I would ask, why does the disease almost invariably begin at a certain season of the year? “ Regnat in vere, in æstate magis, plus in autumno*.” “ Crescente anno (says Sydenham) adolescit, eademque vergente collabascit, donec tandem acrem in diathesin huic morbo adversantem, gracilis bruma transmutet†.” There is no more contact at one season of the year than at another to account for this difference, nor can we admit that the mortality of 10,000 in one day, as happened at Rome in the reign of Titus, and at Constantinople, as related by Procopius‡, was owing to any extraordinary adunation of people. “ Ægyptus nostra tempestate (says Mongio) singulo triennio peste laborat, hæc neque medicamentis neque levi ingenio evitatur, sole tamen leone subeunte inclinatur statim, et *nullo adjuvante* aboletur.”

I do not mean to deny that contact generates the disease ; on the contrary, I am persuaded that

* Ficino, cap. vi.

† Op. sec. 2. cap. ii. p. 108 ; see also Table No. I. of the progress of the plague at Malta and other places.

‡ De bello Persico, lib. 2.

this or vicinity, particularly if long continued, is the most certain mode of communicating it, as the history of the progress of the plague at Malta sufficiently illustrates; but I am inclined to deny that this is essential to the propagation of the contagion.

It appears to me, that this contagion or principle of plague, is diffusible in the atmosphere to a distance greater or less from an infected body, according to the climate and season of the year, and possibly to other peculiar states of the atmosphere, with which we are unacquainted: that in the spring or summer season, a single infected person is sufficient to contaminate the air of a whole city; and that those who happen to be then exposed to febrile causes, or otherwise predisposed, are the first to become its victims. That these newly infected persons generate a fresh supply of poison, increasing its strength and influence, till at length it becomes so powerful, that nothing but the winter season will entirely put a stop to it. Nor is this wide diffusibility of the pestilential poison from the body of one man, more wonderful than that of a grain of musk that will *sensibly* affect the air in a room for twenty years together, without suffering any diminution of its volume.

In this way, and in this way alone, are we able to explain the first introduction of the plague into Malta, in the year 1813. From the nature of this

situation, and from the description of the people who governed and inhabited it at that period, Malta was better calculated to clear up this point than almost any other place. So active indeed was every eye, and so anxious every heart, from knowing that the plague was within the port, that it is next to an impossibility that it could have been brought in by clandestine intercourse. The crew of the infected ship was securely locked up in the lazaret; guards were placed upon the ship itself as long as it continued in the harbour, while every suspected person was seized and carried to the lazaret. But all was to no purpose. The disease seemed to laugh at their exertions, while it jumped from house to house, and from street to street. Those who had no communication together, as well as those who had, fell alike victims to its fury. Nothing could bring to light the way in which the infection was brought. Surely, if any evidence had been forthcoming, it would not have been kept back when a free pardon was offered to the delinquents, besides a reward of a thousand scudes; or, if this was not sufficient, the dreadful anathemas that issued from the Church, could not have failed to produce confession. As many of the guard must have been in the secret, had any thing been taken from the ship, is it not probable that some one of these would have stepped forward to accept this reward and forgiveness? That the disease was brought in by plundering the ship, however, is rendered still less

probable, from the circumstance of nothing happening to the men who reconducted her to Alexandria, nor yet to those who took out the cargo.

It is to be remarked that the disease broke out on both sides of the lazaret nearly at the same time, and in two families that had no communication with each other; the first known case happening in a family subject to cutaneous diseases, and the other in a boy who had been scrofulous or otherwise diseased from his infancy. As I have already observed, no communication was proved between these two families, neither was any detected between these and the children of Stillini the baker, who was attacked on the 14th May.

Having failed then completely in ascertaining the source of the contagion in this way, they attempted to trace it through quite a different channel, but with equal want of success. It was discovered that Salvator Borg, who was a shoemaker, had purchased some linen to line shoes with, from a Jew, which linen had been brought from Alexandria; but on referring to the Jew, they found him in perfect health, while the linen in question had undergone the process of quarantine and purification at Zante. I mention this circumstance, principally to shew the complete failure in attempting to account for the disease by means of the ship; for, had the slightest proof been brought forward in support of these conjectures, they

would certainly not have abandoned them for the story of the linen.

Since no proof whatever then was adduced of the disease being introduced by any visible agent, it is fair at least not to deny that it came through the medium of the air, and from the bodies of those two men who died and were buried in the lazaret. This conclusion is borne out by analogy with the contagion of other diseases, as well as by the opinions of the most enlightened philosophers and physicians of ancient times, who saw more of the plague in one season than we do in an age.

As the introduction of the great plague at Messina in the year 1743 was strikingly analogous to that which I have been describing, and as the former has been frequently referred to as an example of the effects of smuggling, I shall give the result of my inquiries into the truth of the statement. The reference I allude to was taken, I think, from an anonymous writer of a letter, quoted by Russell*, which sets forth, that a fisherman, on his death-bed, confessed that he had smuggled some bales of tobacco, covered with infected canvas, and some pieces of linen, from the captain of an infected ship, on the night of his arrival in Messina, and that he had found means to convey

* Page 227.

these articles to a part of the town called Pozzillaria, where in fact the disease first appeared. Now the authority upon which this statement is made rests, as I have observed, on an anonymous writer of a letter, who was probably a mere spectator, and did it to amuse his friends, on the report of the day. But neither Turriano, who was secretary to the Senate at that time, and wrote an account of the plague two years afterwards, nor the Deputy of Health, who published another account of it, by authority, in the same year (1745), were acquainted with the circumstance. These respectable authors give the following account of the matter.

On the 20th March, 1743, a ship arrived from the Levant, on board of which three men had died during the voyage. But in consequence of the captain's misrepresentation and concealment of the fact, the ship was admitted to perform her quarantine in the harbour. Two days after her arrival, the captain was taken ill in the lazaret, and died of the plague, and his death was soon followed by that of another of the crew, from the same distemper. The same precautions had been taken, previous to their landing, as at Malta. The nature of the disease was immediately ascertained, and the bodies were buried in the lazaret with the utmost precaution. The remainder of the crew continued in good health. The ship was strictly guarded in the harbour till the expiration

of ten days, when she was taken to a distance of ten miles and burnt. The cargo, and every article belonging to the ship, as well as to the men, were consumed. These things being effected without the least apparent mischief, the people of Messina were highly delighted with their success in escaping the contagion; but forty days afterwards the disease was discovered to be in the town.

On examining two of the survivors of the crew, on oath, before the Deputation of Health, they made the following deposition respecting the communication they had with the shore while lying in quarantine.

“During the first days of quarantine, the aforesaid master gave to Camale Giulio Sangallo a canister of biscuit, covered with a napkin, which was thrown from the canister in the act of delivering it to him; in the same manner, he also gave biscuits and wine to the guards who were in charge of the said vessel*.”

This then was all the communication that could be traced, according to Turriano; and the other author (whose name is not given) expressly says, “But how it (the plague) came into it (Messina) from the infected ship, it is not easy to determine, because the confusion and devastation that fol-

* *Memoria Storica della peste di Messina*, c. xi. p. 94.

lowed, having interrupted the inquisition which they had begun to put in force, left no means of bringing the matter to light*.”

It is extremely probable, then, notwithstanding the above statement to the contrary, that the plague at Messina was introduced exactly in the same way as that at Malta, *viz.* through the medium of the air, and proceeding from the bodies of the two men who died and were buried in the lazaret. It may be observed, that the distance from the lazaret to the town is nearly equal in both cases, *i. e.* about a quarter of a mile. It has been alleged against my opinion, however, that the disease in this way must have made its appearance earlier in the town than forty days. But the argument has no weight, for the disease in all probability existed there long before it was noticed by the physicians, as, no doubt, is frequently the case. The ignorance of the Messina physicians, indeed, was abundantly proved, by their stating, at a full meeting held on the 15th May—“that, having observed the disease, and considered with every attention the essence and quality of the disease, they did not find, on any account whatever, that it was contagious and pestilential, but that they believed it to be the same epidemic as they had seen in February†.” If the physicians did

* Relazione Storica della peste nel anno 1743, c. ii. p. 14.

† Memoria Storica.

not recognize the disease at this period, no wonder that they did not perceive it sooner.

It may be thought by some that I have been too minute in endeavouring to decide this question. Its importance, however, demands the utmost consideration, inasmuch as the safety and welfare of kingdoms may depend upon it. And if, after all, I am wrong in my conclusions, I am right in adopting them, since the converse cannot be proved; for had they been adopted and acted upon on the two foregoing occasions, thirty-eight thousand deaths from pestilence in the one case, and nearly six thousand in the other, would certainly have been prevented.

As relates to the past, my opinions are of little consequence; but I mean, by pointing out the errors that have happened, to shew how they are to be avoided in future. In this way I may save the lives of thousands.

Instead, then, of voluntarily admitting ships known to be infected with plague into the very bosom of our cities, we ought to use the utmost vigilance to prevent such an occurrence: not, however, by compelling the unfortunate crew to seek refuge amongst the merciless waves, but by erecting lazarets in such situations as would not endanger the public safety. Neither does it follow, that because the founders of existing ones

were ignorant of the laws of the contagion, they should be continued in use.

I shall conclude by relating another example of the fatal effects of imprudence in the Sicilian Government. In the month of December, 1570, a ship, whose crew was infected with a pestilential disease, arrived at Siacca from Tunis, when the officers of health very properly refused her admittance. The President, Don Carlo d'Arragona, who then governed the kingdom, hearing of the circumstance, censured the officers, and ordered the ship to be received into the port of Trapani. The consequence was, as is natural to expect, the disease was communicated to the inhabitants of that town*.

* Paris, lib. vii. c. 50.

TABLE

Shewing the relative progress of the Plague during the season in Malta and other places.

Months.	Malta.	Dantzic.	Aleppo.		London.					Valetta.
	1813	1709	1761	1762	1593	1603	1625	1636	1665	1813
March					63	11	23			
April	3		384	867	138	26	85	37	2	3
May	111		777	1432	167	83	224	162	43	90
June	802	319	2330	5537	468	362	894	440	1060	472
July	1595	1313	1726	2115	2930	2999	5887	456	5667	687
August	1041	6130	476	387	2880	8919	16454	1239	18036	319
September	674	8303	403	224	2200	11904	9379	3856	51159	68
October	209	4932	438		1260	4012	1514	2686	9444	27
November	53	1961	544		710	1552	256	2592	3449	
December		584	692		290	324	37	640	734	