[illegible] M.
91

4,000—15-11-04.

1898

Local & Munl. (~~190~~) Department.

MISCELLANEOUS.

G.O., No. 1253 M

DATED 12-7-98

[Despatch Abstract.]

Drainage

Stating that the preparation of the watersupply project for Kumbakonam should be proceeded with first, that it would be quite useless to design a general scheme for the —— of the town & that ~~in~~ the meantime small schemes of drainage for the worst parts of the town may be taken up and carried out as funds became available.

BACK PAPERS.

G.O.	No.	Department.	Date.	G.O.	No.	Department.	Date.

FURTHER PAPERS.

G.O.	No.	Department.	Date.	G.O.	No.	Department.	Date.
Cir	3461	4/98					

Drainage of [illegible]

LOCAL AND MUNICIPAL DEPARTMENT.

L. & M.
-16-2-98.

Papers to be read in Proceedings :—

Again G.O., No. 565-M dated 14th March 1898,
Again G.O., No. dated 189 ,
Current No. 187-M of 1898 dated 8th January 98, from the Collector of Tanjore
" " 1491-M " 1898, " 28th April 98, " the Secretary, Sanitary Board
" " 1517-M " 1898, " 29th April 98, " the Sanitary Engineer
" " 1766-M " 1898, " 20th May 98, " " " Commissioner

Misc ORDER. No. 1253 M Mis dy 12-7-98.

The Government considers that the preparation of the water-supply project should be proceeded with first and that it would be quite useless to design a general scheme for the drainage of the town, as the municipal council cannot in the near future undertake the execution of such a project, the cost of which is roughly estimat by the Sanitary Engineer at 17 lak There does not, however, appear to be any reason why small schem of drainage for the worst parts of the town should not, in the mean time, be taken up and carried out as funds become available, seeing that even if such sche do not work in with a genera

-inage scheme, the benefit derivable from their existence for the long interval which must elapse before a general scheme can be executed, will justify the expenditure incurred upon them. The scheme for the drainage of the Solayappa Mudali Street should, therefore be put in hand by the Public Works Department, as soon as the municipal council can provide the necessary funds, and when this work has been completed, the council should, under section 213-A of the amended municipal Act, compel the owners of those houses in the street, which are not provided with drains, to connect their premises with the new drains.

(From orders)

V.R.
5/7/98

H.T.
8 7 98

Dep 11/7/98

Note It is presumed that the question of amending section 213-A, raised by the Honourable Member in his note of the 25th January 1898, may be considered at the next opportunity.

To
The Chairman M.C. Kumbakonam
through the Collector of Tanjore
" Sanitary Board
" " Commissioner
" " Engineer
" Public Works Department

Again G.O. No. [illegible]

1517. M. & 1766 M.

Drainage of Kumbakonam

3

para. 65 of the budget letter in G.O. No 565 M. 14-3-98 A.

H.M.

FOR ORDERS.

In the budget for 1898-99, the Municipal Council of Kumbakonam proposed to raise a loan of Rs.35,000 for the purpose of carrying out the following among other sanitary works:-

(I) the drainage of
(a) the Patnulgar quarters
(b) Solayappa Mudali street
(ii) Subsidiary drains leading to main drainage channels

and for establishing filters and sewage farms in selected blocks of the town, as funds became available, the blocks being so arranaged that they can be afterwards connected by underground pipes with a general drainage scheme. These proposals were referred by Government to the Sanitary Board for remarks.- Vide para.4 of B. G.O.No.565 M, dated 14th March 1898.

C. 2. In its resolution of the 5th June 1897, the Municipal Council decided to place at the disposal of the Executive Engineer, a sum of Rs.6,250, being the cost of improving the Solayappa Mudali Street drainage, the estimate for which had been sanctioned in G.O.No.2232 W, dated 16th August 1897, communicated with G.O.No. D. 1990 M, dated 15th September 1897, for execution by the Public Works Department. The Chairman, however, dissented from the resolution and requested that Government ~~would~~ wants be pleased to direct that the work be deferred for the present, for the following among other reasons, namely:-

(1) that the work although meant for the benefit of 43 houses, would really benefit only 13 houses, as no more than this number had drains opening in the public street.

Vide G.O. No. 1270 M / 30-7-96 I.

(2) that no provision was made for the work in the Municipal Budget.

(3) that the financial position of the Municipality did not permit of an allotment being made for the purpose.

(4) that under the advice, both of the Sanitary Commissioner and the Special Commissioned Medical Officer on Mahamakham duty, a Vizianagram filter had been built and worked satisfactorily so far, and it was desirable to give it a fair trial for a whole year to see if it proves a failure in the rainy season, and

(5) that it was necessary first to attend to the water logged portions of the town and connect them with the drainage system already in working order. In forwarding the Chairman's letters above referred to, the Collector remarked - (vide Cur.No. 187 M) that the Executive Engineer had in the meantime raised some objections to the scheme for draining the Solayappa Mudali street as sanctioned by Government, that it was desirable that the Sanitary Engineer should consider these objections and that in view of the fact that comprehensive schemes for the drainage and water supply of the town would shortly be prepared, it was desirable to ascertain whether the present scheme would fit in with the whole, as otherwise any outlay on these small schemes would, in the long run, be money and labour wasted. This correspondence was also referred to the Sanitary Board for remarks.

E.

G.O. No. 92 / 26-1-98

3. In reply to the referances mentioned in paras. 1 and 2 above, the Board states

F. (vide Cur.No.1491 M) that as it is not certain that the schemes for the drainage of the Patnulgar quarters and Solayappa Mudali street, costing Rs.25,000 and Rs.6250 respectively, will work into a general ~~sch~~ scheme, it considers that it will be a mistake to design works of this kind piecemeal and it therefore advises that the Sanitary Engineer be directed to draw up a complete scheme for the drainage of the town, which, when sanctioned, can be carried out piecemeal, as funds permit.

G. 4. In Cur.No.1517 M, the Sanitary Engineer states that the water supply scheme, for which the Council has granted funds, is now under survey and will be preceeded with and that there is no advantage whatever in taking up the two schemes of water supply and drainage together, the surveys and levels required for the one being of quite a different nature from those required for the other. Further, as the cost of a complete scheme for the drainage of the town will amount to something like 17 lakhs of rupees and for ~~wat~~ water supply 5 lakhs, the Sanitary Engineer considers that it is not on the bounds of possibility that the Municipal Council even with the most liberal aid from Government will within the next quarter of a atury be able to undertake both the schemes and that therefore the proper course will be to proceed with the small schemes which appear to be urgently wanted. Moreover, in view of the fact that the Sanitary Board now recommends the abandonment of the scheme already sanctioned for draining Solayappa Mudali street and of the one for the drainage of Patnulgar quarters, which, under the orders of the Board itself, is now under investigation, and to obviate great expense and waste of labour caused by constant change of policy, the Sanitary Engineer requests that Government will be pleased to decide:-

(1) whether the ~~waste~~ water supply scheme now being investigated is to precede the drainage investigation,

(2) whether the large drainage scheme is to be investigated at all;

(3) whether small schemes may not be prepared for the temporary improvement of the worst parts of the town, and

(4) whether the Solayappa Mudali street drainage may not now be begun and handed over to him for execution.

5. In the last letter read above, the Sanitary Commissioner considers that if on account of financial conditions, only one scheme is feasible at present, that for water supply should certainly have the preference. Pending the possibility of introducing a correct sewerage scheme in any part of the town, he believes that the proposal of the Municipal Chairman to form small sewage cultivation plots and to use sewage filtration at certain points, judicious and

I consider that the first thing to do is to get on with the Water Supply scheme & that it wd. be quite useless to proceed now to prepare a general drainage scheme at the same time. I dont see why small schemes of drainage for the worst parts of the town should not be taken up & carried out as funds are available. They may, or may not, work in with the general drainage scheme, when prepared; but, if they do not, the benefit derivable from their existence for a length of time, which must be great, will be considerable & will justify the expenditure upon them. The Solayappa Mudali St. scheme should .·. be carried out as already advised if funds can be found. Of course the owners of the 30 houses not now connected with the drains must be compelled to connect their premises with the new drains when made. If S. 213 A is ineffective because it does not provide for there being a general system of drainage in a particular part of a town, it must be amended.

H.

HS
25/6/98

? not

and suitable and in accord with the best sanitary teaching, but he thinks that such methods should not be effected in a mere make-shift manner and without any relation to any future general schemes. As regards the method of using partial schemes to be ultimately joined up as suggested by the Sanitary Board, Dr. King says that he would approve of it only on the condition that conservancy is combined with the general scheme as the primary point sought, so as to serve the entire town and he thinks that this would be possible in Kumbakonam by the use of the Shone's pneumatic ~~pneumatic~~ system combined with pail depots. From consultation with Mr. Ault on the adaptability of the Shone's system of sewerage for conservancy as the prime object with the gradual addition of sewage as parts of the town are drained, the Sanitary Commissioner believes that this method could be worked with economy and would suit native requirements.

6. It is submitted that Government may approve of the Sanitary Board's recommendation that the schemes for the drainage of the Patnulgar quarters and the Solayappa Mudali street should, for the present be abandoned and that the Sanitary Engineer should be informed that although a complete scheme of drainage is not likely to be executed all at once, there is no reason why such parts of it as will fit in with the whole should not be carried out from time to time as funds permit. The Sanitary Engineer may also be told that he should proceed with the water supply

scheme, now under investigation, and that the preparation of a drainage scheme should be undertaken when his other duties permit.

V.R.
14/6/98

H.T.
20.6.98

[illegible] Current No.
Recd. 27-1-98
Encls: 7.

Local & Munl. (1898) Department.

CURRENT No. 187 M

From The Collector of Tanjore

TO BE RETURNED WITH REPLY.

SECRETARY TO GOVERNMENT
15 JAN 1898
LOCAL & MUNICIPAL DEPARTMENT

~~Reference~~ No. 250/M.C. of 97.

No. 92 / 26-1-98
~~Order~~

Referred to the Sanitary Board for early remarks.

H Tremenheere

Dated 8th January 1898.

Received 15-1-1898

Registered

Enclosures 3/

Spare copies.

V.R.
24/1/98

Ag Secretary to Govt.

The President

No. 67/5 dated despd. 31-2-98

Referred to the Sanitary Engineer who is requested to be so good as to favour the Sanitary Board with his remarks at an early date, ~~the Sanitary Board~~ especially with reference to the points brought forward by the Collector in his Endorsement on Ref. No. 250/M.C. d/8th Jany 1898.

(By order)
R.S.
28 Jan 98.

24/1

SUBJECT.

Submitting with remarks Kumbakonam Municipal Chairman's letter on the question of the Solagappa Mudaly drainage scheme in Kumbakonam Town.

To The S. E. with papers in original - to be returned.

31.1.98

BACK PAPERS.

G.O.	No.	Department.	Date.
Go	122	Mul	18-1-98
„	1990	Mul	15-9-97
„	715	Mul	27-3-97
„	1270	Mul	30-7-96

FURTHER PAPERS.

G.O.	No.	Department.	Date.

10/1491 M/98

SUB-COLLECTOR'S OFFICE 21 OCT. 97 TANJORE.

SANITARY ENGINEER Reg. No. 620 1 APR. 98 TO THE GOVERNMENT OF MADRAS

Local & Munl. (1897) Department.

250 M/ Mtg 97

For orders

1-11-97

CURRENT No.

Current No. 5019/Rev of 1897

From

The Chairman,
Municipal Council,
Kumbakonam

No. 674.

Order.

Dated 19th October 1897.
Received
Registered
Enclosures Two.
Spare copies

COLLECTOR & MAGISTRATE 28 OCT. 1897 TANJORE.

SUBJECT.

Requesting that under the circumstances stated, the execution of the Sholayappa Mudaly Street Drainage Works may be deferred for the present.

Budget not.

M 28/10/97

NS/28 10

BACK PAPERS.

G.O.	No.	Department.	Date.

FURTHER PAPERS.

G.O.	No.	Department.	Date.

Proceedings of the Meeting of the Municipal Council, Kumbakonam, held on the 5th June 1897.

Present

M.R.Ry. T. S. Sivasamy Odayar Avergal, Chairman
„ Rao Bahadur S. Seshayya „ B.A.
„ Rao Bahadur S. Appu Sastriar „ B.A.
„ K. Runganada Raoji „ B.A.
„ N. Kistnasamy Iyengar „ B.A. B.L.
„ J. V. Battrasamy Chettiar „
„ T. S. Sivavadivelu Odayar „
„ N. Kistnasamy Chettiar „
„ A. Rangasamy Chettiar „
„ S. Vyapuri Mudaliar „
„ S. Sivagurunada Chettiar „ B.A. B.L.
„ A. C. Narayanasamy Iyer „
„ N. Vaidyanada Iyer „ M.A.
„ V. Kristna Iyer „ B.A. B.L.
„ V. T. Chinnasamy Pillai „
„ M. C. Dorasamy Chettiar „
„ M. C. Amirthalinga Chettiar „
„ C. R. Jegannada Chettiar „

× × ×

3. Read letter from the Executive Engineer, Tanjore Division No. 2086 dated 14. 5. 97 requesting

the Council to keep the sum of Rs 2020 the estimated cost of improving the Solayappa Mudaly Street Drainage at his command, that the work may be completed before the end of the current year.

Proposed by M.R.Ry. Rao Bahadur S. Seshayya Avergal that the required amount be placed at the disposal of the Executive Engineer at once, inasmuch as the sewage in question is dangerous to public health and the Viziaragaram Filters are inadequate to minimise to any degree the nuisance in question, and as funds could be found for the work from the expected increase in House Tax and from savings in other allotments of the budget. Seconded by M.R.Ry. K. Renganada Rao Avergal and carried by a majority of 16, one not voting and the Chairman dissenting.

× × ×

(S) T. S. Sivasamy Odayar

Chairman

(True Copy)

T. S. Sivasamy Odayar

Chairman

9
1491 M/98

S.C. No. 211 of 98

1
187 M of 1898

S.C. No. 49/98

SANITARY COMMISSIONER TO THE GOVERNMENT OF MADRAS
Reg. No. 670
1 APR 98

Proceedings of the Special Meeting of the Municipal Council, Kumbakonam, held on the 17th July 1897.

Present

M.R.Ry.	T. S. Sivasamy Odayar Avergal, Chairman		
"	Rao Bahadur S. Seshayya	"	B.A.
"	K. Renganadha Rao	"	B.A.
"	Rao Bahadur S. Appu Sastriar	"	B.A.
"	A. C. Narayanasamy Iyer	"	
"	N. Vaidyanada Iyer	"	M.A.
"	V. Krishna Iyer	"	B.A.B.L.
"	T. Krishnamachariar	"	B.A.
"	A. Ramalinga Chettiar	"	
"	N. Krishnasamy Iyengar	"	B.A.B.L.
"	S. Sivagurunada Chettiar	"	B.A.B.L.
"	V. S. Chinnasamy Pillai	"	
"	S. Vyapuri Mudaliar	"	
"	T. S. Sivanadian Odayar	"	
"	J. V. Battrasamy Chettiar	"	
"	A. Rangasamy Chettiar	"	
"	M. C. Dorasamy Chettiar	"	
"	M. C. Amirthalinga Chettiar	"	

× × ×

11. A sum of Rs 2500 out of Rs 3000 allotted in the budget for Drainage Works be placed at the

disposal of the Executive Engineer and he be requested to commence early the Solayappa Mudaly Street Drainage Works. Further allotments will be made as the work proceeds.

× × ×

(S) T. S. Sivasamy Odayar
Chairman

(True Copy)

T. S. Sivasamy Odayar
Chairman

Sent

2
S. C. No. 211 of 98

8
14 91 M of 98

2
181 M of 1898

2
S. C. No. 49 of 98

SANITARY ... TO THE GOVERNMENT OF MADRAS
Reg. No. 670
1 APR 98

15

No. 674.

MUNICIPAL COUNCILORS' OFFICE

KUMBAKONAM 19th October 1897.

FROM

T. S. Sivasamy Odayar Avergal.
CHAIRMAN, MUNICIPPAL COUNCIL
KUMBAKONAM.

TO

The Secretary to Government,
Local & Municipal Department,
Thro' the Sub Collector & the Collector of Tanjore

SIR,

In forwarding the accompanying resolutions of the Council for such orders as Government may deem proper, I have the honor to bring the following facts to the consideration of Government:—

1. The work that is meant to be carried out at a cost of such a large outlay as Rs 6250 is for the benefit of the inhabitants of 13 houses in Reddy Rowi's Tank north side at the present time.

2. For various reasons this work was not taken in hand during the last financial year and the provision made in the budget of that year had lapsed.

3. A new allotment has to be made for the same as no funds are provided in the current year's budget.

4. The finances of this Council as far as a forecast

may be made just now are such as not to allow of such a work being undertaken during the year for the following reasons:-

(a) A gross income of Rs 28,000 was expected from tolls: at the sale the highest bid was only for Rs 24,400.

(b) The Professional tax under the new Act would be about three-fourths of the estimated income which has been put down at Rs 11,000.

(c) The opening balance was according to the budget of previous year not less than Rs 20,000, but according to this year it was only Rs 6730, with a liability for works executed in March last and paid for in subsequent months to the extent of Rs 2000.

(d) Under minor items such as those of markets, slaughter houses &c there has been a deficit of Rs 230, against a budget estimate of Rs 6100.

(E) The expected increase in the tax on Buildings on which the Council depends cannot yet be regarded as realized as it is not possible to tell how many appeals would be preferred and what remissions would be granted by the Council. As a matter of fact, the house tax bills for the current financial year have not been issued pending the revision which was completed only a few days ago by the Special Deputy Collector.

5. In deference to the wishes of the Sanitary Commissioner who has been repeatedly calling the attention of this Council to the cheapness and

usefulness of the Vizagapatam Filter in general and also to the suggestions of Surgeon-Captain W. C. Vickers, Special Commissioned Officer on Mahamakham duty in particular, I caused the present filter to be built immediately after the Mahamakham festival and the filter is working satisfactorily. To make it a complete success, all that is required is to acquire a portion of land near the drain to serve as a sewage farm. It may be urged that though it works well now, in the rainy weather it might prove a failure. But that has to be proved again. A fair trial may be allowed to the filter during the whole of the current year and if it does prove a failure (which I very much doubt) it will then be time to think of some other plan.

6. The Sanitary Commissioner may again be consulted as also the Sanitary Engineer and some cheaper method of disposal of sewage devised.

7. If it is found impossible to think of anything else for the mitigation of the nuisance, then the plan already prepared by the Sanitary Engineer may be adopted.

8. I am personally not averse to doing anything that may conduce to the improvement of the health of the people. All that I plead for is

when

18

therefore
when a work can be done at a cheaper rate and all the benefits too of the costlier scheme thereby derived, there is no need to launch into a large expenditure of money especially at a time when the finances of the Council are of dubious elasticity.

9. I may point out the necessity of first attending to the waterlogged portions of the town which have to be connected with the Drainage System already working in order that the health of the town as a whole may be perceptibly improved. It is the perennial dampness of certain parts of the town that breeds Cholera and until the same source of epidemic is completely stamped out it will, in my humble opinion, be too early to think of other Schemes.

10. Government have in its order No 1990 Mis dated 15.9.97 sanctioned the execution of the work by the Public Works Department. The Executive Engineer has written to me asking me to provide the requisite funds.

11. Government has also desired that the expenditure of cash balances in the Treasury should be curtailed as much as possible.

In these circumstances I request that Government will be pleased to direct that the work be deferred for the present.

I have the honour to be
Sir
your most obedient Servant
S. Sivasawmy Aiyar
Chairman

7/1491 M/98

3/L.G. No 211 of 98

3/S.C. No 149 '98

3/187 M of 1898

Ind. K.V.

SANITARY ENGINEER
Reg. No. M 670
1 APR 98
TO THE GOVERNMENT OF MADRAS

19

SANITARY ENGINEER
Reg. No. M 670
1 APR 98
TO THE GOVERNMENT OF MADRAS

Local & Munl. (1897) Department.

CURRENT No.

rrent No. 5019/M of 1897 Rt.

From
The Chairman
Municipal Council
Kumbakonam

Order.

No. 681.

Dated 22. 10. 97.
Received
Registered
Enclosures Nil
Spare copies

COLLECTOR
28 OCT. 1897
TANJORE

SUBJECT.

Furnishing certain additional information in connection with the Solayapa Mudaly Street Drainage Scheme.

BACK PAPERS.

G.O.	No.	Department.	Date.

FURTHER PAPERS.

G.O.	No.	Department.	Date.

No. 681.

MUNICIPAL COUNCILORS' OFFICE

KUMBAKONAM 22nd October 1897.

FROM M R Ry
T. S. Sivaswami Odayar Avargal
CHAIRMAN, MUNICIPAL COUNCIL
KUMBAKONAM.

To
The Secretary to Government
Local & Municipal Department
Madras
through the Sub Collector & the Collector of Tanjore

SIR,

In continuation of this office letter No 674 dated 19th Instant and with special reference to para 1 of the same, I have the honour to inform you that the scheme costing Rs 6250 is according to G. O. No 1270 $\frac{L}{Mun}$ dated 30. 7. 96, for the benefit of 43 houses. In stating that it was meant only for the benefit of 13 houses, I only desired to draw special attention to the fact that these 13 houses alone were to receive the benefit in particular as they alone have drains in the public street. The remaining 30 houses should first have drains constructed for them and in its course, the sewage line of pipes would receive the sewage of such houses.

As I have not got the plans in this office at present, I am unable to give more detailed information.

I have the honor to be
Sir
Your most obedient servant
S. Sivaswamy Aiyr
Chairman

K.V.
22.10.97

Dis No 2631 of 97.
Rev
Enc out.

Forwarded.

2. If the Chairman was not prepar to carry out the wishes of the council as expressed in their resolutions date 5th June and 17th July, he should hav made this reference at once — not afte a delay of more than 3 months.

3. A sum of Rs 2500 has been voted from an allotment in the current year's budget: the provision of Rs 3750 in next year's budget may be a matter of some difficulty, but there is no reason to doubt its possibility.

COLLECTOR & MAGISTRATE, 28 OCT. 1897 TANJORE.

4. In his second letter the chairman has corrected the mis-statement in his first regarding the number of houses for which the scheme is intended. However it is a question not so much of the number of houses immediately benefited

as of the desirability of removing at least one plague spot from the Town. The Council has steadily supported this scheme ever since ~~August~~ 1895, and I do not think it should be rejected or deferred, because there are other places also calling for attention.

5. I sympathise with the Chairman's desire not to spend more money than is necessary; but the effectiveness of any cheaper remedy is very doubtful. After personal inspection, I cannot assent to the Chairman's view that the existing Vizianagaram filter is "working satisfactorily," that is, if it is meant to imply that it diminishes the nuisance to any marked extent. The sewage after passing through the filter still stinks abominably, and as there is no outlet it lies stagnating by the side of the street.

6. At the same time there is a strong conflict of opinion on certain points of the Sanctioned Scheme, between the Executive Engineer and the Sanitary Engineer to Government. It is not for me to offer an opinion on professional matters, but I enclose Copy of the last letter written by Mr Norfor on the Subject Subsequent to the date of G.O. No 2232 W. dated 16.8.97. It would be well to have these points finally settled before commencing the work.

in G.O. 1990 M / 15.9.97

Kumbakonam
24-10-97

Ag Sub Collector

27 OCT. 97

1491 m/98

SANITARY ENGINEER
Reg. No 620
1 APR 98
TO THE GOVERNMENT OF MADRAS.

J.C. No 109/98

Copy of a letter from the Executive Engineer Tanjore to the Superintending Engineer V circle Madras dated 14.9.97 No 3821.

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in G.O. 1990 M / 15.9.97

With reference to G.O. No 2232 W. / 16.8.97, I have the honor to state that the work will be carried out as sanctioned, but I would beg to offer the following remarks on Mr Jones' No 633 dated 30.3.97, published with the above quoted G.O., and as I am the officer to execute the work, I consider it my duty to point out defects, now, and before the work is carried out to completion.

2. In para 2, Mr Jones states that there is a valid reason against my proposal of raising the overflow level to 57.00; the reason given being that the sewer would require to be more than full before the overflow comes into operation and that it would cause an increase pressure on the inside of sewer. I must confess I cannot follow his arguments. All I have proposed is to raise overflow

flow level from 56·00 to 57·00 or but one foot which cannot possibly make cause any appreciable increase of pressure in the inside of Sewer. The Sewer even with overflow at 56·00 will flow more than full for almost its whole length, i.e. out of a total length of 1430 feet, it will flow more than full for about 1330 feet

3. The level of Sewer at inlet to well is 49·00, that is, there is a depth of water here of 6·75' measured to centre of Sewer. My proposal was to make this depth 7·75' instead because we can afford to do so, the levels of inlets to intercepting sewer ranging from 58·00 to 60·00 and therefore we could easily raise level of Sewer one foot if necessary. Besides as the overflow level is 56·00, as fixed by Mr Jones, and the M.F.L is 57·50, and as this is a constant level during the N.E. Monsoon this pressure (and more) which Mr Jones wants to avoid must frequently happen, if the work is carried out as designed. Mr Jones is

is altogether mistaken in supposing the maximum flood but seldom occurs, as he states in para 3. This is only the early part of September and the level of water now stands at 56·40 or ·40 above his overflow level.

4. In my opinion the higher the overflow level is fixed the better, or in other words the less chance there is of spill the better, especially as there does not seem any way of preventing the mixture of filtered and unfiltered sewage.

5. I would draw your attention to my letter No 1992/10·5·97 wherein I pointed out that the channels for overflow and outlet if carried out as designed would be under water during almost the whole of the irrigation season; i.e. it will be under water for 8 out of 12 months during which time there can be no baling of Sewage.

6. Provided the banks of these channels are raised above M.F.L. I am not very keen on raising the overflow level to 57·00. If

they are made as designed, they will be breached every year and will be an endless source of trouble; in fact these channels would be no longer channels or "discoverable" as such.

7. I am unable to follow Mr Jones in the latter part of para 3.

8. It was not my intention that the overflow channel banks only should be raised, but the outfall channel banks also. It would, of course, be useless raising one and not the other. I am of opinion that as the place where the well and filter beds (P.R.O.) are to be built is a small tank in the irrigation season, no sewage water should be allowed in it, but that such water should be carried right away into a flowing stream, which could be done if my section of channel be adopted. There is also a pond close by. Why contaminate it unnecessarily? a point I omitted to notice in my previous letters, I now beg to notice, and that is that whatever section of channel is adopted it should not interfere with the drainage over which it passes and for this purpose, one or two earthenware pipes would be required.

9. Mr Jones' plans have been drawn up without the point of water levels being considered at all, proved by the fact that he has not shown any water levels on them

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Ag Sub Collector

D C

6
J.C. No 211/9/98

SANITARY ENGINEER
Reg. No. Cm 670
1 APR. 98
TO THE GOVERNMENT OF MADRAS.

4
1491 M/98

6
J.C. No 9/98

Ref. on cur no. 250/ML of '97

Forwarded.

187 M

2. Since receiving the Chairman's letter I have inspected the locality and have consulted the Executive Engineer, Mr. Norfor who very kindly showed me the plans and explained the same. At my request he also consulted the Sanitary Engineer a few weeks ago when the latter passed through Tanjore and I understand from Mr. Norfor that Mr. Jones sees the force of Mr. Norfor's objections to certain details of the scheme as at present drawn up, & he will no doubt be glad to consider the objections if Mr. Nafor's letter No 3,821, dated 14th September 1897, to the Superintending Engineer is sent to the Sanitary Board. The letter was not forwarded to Government as the Superintending Engineer considered it unnecessary to do so, Government having already passed final orders on the scheme.

3. The main objections raised by Mr. Norfor to the present Scheme as disclosed in his letter of [illegible] September, as well as — I believe — in another letter to the Superintending Engineer, are the following: —

(1) Owing to the level of the surrounding paddy fields, and to the low level of the bank of the proposed Channel leading from the Sewage filter, the Sewage (unfiltered as well as filtered) will mix with the drainage from the surrounding fields. And much of this drainage water will be carried off in the Channel meant for Sewage alone, and — what is far worse — much of the Sewage (unfiltered and filtered) will mingle with that drainage, and contaminate a pond close by, and also (I have no doubt)

make

make its way to many other places. This will happen not only during high floods, but constantly for about six months, during every year of average rainfall.

(2) The surrounding drainage will during the rainy season frequently find its way into the Sewage well, instead of the Sewage finding its way from the well into the filter bed.

(3) The banks of the proposed Channel from the filter bed will be subject to frequent breaches.

(4) The filtered Sewage water — mixed with much that is unfiltered as above noted — will find its way into the "Varaka", a large masonry tank in the town. On the morning of my inspection, I saw a number of people washing their clothes and bathing in this tank, and the Chairman informs me that people take this water home for cooking purposes, and

then

and there is no guarantee that they do not drink it unboiled; in fact it may be assumed as pretty certain that they do. The Sanitary Commissioner has strong views as to the danger of cholera spreading from polluted tanks in which people bathe or wash, even if they do not drink the water. The Chairman also informs me that a section of the community attaches ~~more~~ some importance to this tank on account of its sanctity. It appears to me therefore most unwise to execute a work which will result ~~only~~ in polluting with sewage a tank, the water of which is used for bathing, washing and domestic purposes. It might be ~~argued~~ urged that the tank should be absolutely closed to the public, but the extent to which any magisterial order would be permanently effective is problematical, and I see no need for polluting the tank at all.

as

as Mr. Norfor proposes another way of carrying off the sewage, viz across a channel whence it might be conveyed to another drainage channel, or — better still if possible — to a sewage farm. Scarcely any of the correspondence has passed through my office, and I do not know if the Sanitary Commissioner is aware of this last objection to the scheme.

4. As regards the Chairman's remark on the Vizianagaram filter, I agree to a very great extent with the Sub Collector. When I saw it a few weeks ago, even the filtered sewage emitted an offensive smell, though that might be largely minimised in a manner suggested to me by the Civil Apothecary who was present, and I am writing to the Chairman to see if this can be done. The Vizianagaram filter system, however, in any case, mitigates rather than removes the nuisance, and should

not be taken as a Satisfactory Substitute for a proper System of Sewage Drainage.

5. I beg to refer to the marginally× noted references on the proposal of the Council to have Schemes for the water Supply and Drainage prepared at once. I do not know if this present Scheme will fit in with the whole. If not, possibly the result might be that this Scheme would, in the long run, be money and labour wasted. The Sanitary Engineer might be asked to Consider this point, if he did not do so when he framed the Scheme.

× Kumbakonam Municipal Chairman's letters Nos 760, dated 29th November 1897, and 772, dated 3rd December 1897 forwarded with my Endt. on Cur. Nos 339 and 347 of 97 dated 24th December 97 and 29th December 97.

× in GO 122 M 18-1-98

6. Mr. Nafor has informed me that the Scheme does not provide for flushing the drains. The Sanitary Engineer might be asked for his remarks on this point also.

7. In writing the above remarks, it should be borne in mind that I have written without any pretensions to understanding the Scheme as a professional Officer, and it may be that I have in some points misapprehended Mr. Nafor or the Scheme itself, or I may have expressed myself in a very unscientific manner.

Tanjore Collector's Office
8th January 1898

Ag. Collector.

7
S.C. No 211 7/7/98

SANITARY ENGINEER
Reg. No. 670
1 APR. 98
TO THE GOVERNMENT OF MADRAS.

3
1491 m/98

7
S.C. No 49 7/7/98

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137

Local & Munl. (1898) Department.

CURRENT No. 1491 M

UNDER SECY. TO GOVT.
29 APR 98
PUBLIC WORKS DEPT.

Order.

From

The Secretary,
Sanitary Board

No. 265/s

Dated 28 April 1898.
Received
Registered
Enclosures with papers in original (10) & 1 Portfolio of plans
Spare copies

Enc 11.

SUBJECT.

Drainage of Kumbakonam

Considering it to be a great mistake to design detached works like Solayappa Mudali Street Drainage & Natraja Street Drainage, advises that the Sanitary Engineer be directed to draw up a complete scheme for the ——— which, when sanctioned, can be taken up in piecemeal as funds permit.

S.C. 4 APR 98 6/5

BACK PAPERS.

G.O.	No.	Department.	Date.
fo	565	L	14-3-98
"	122	L	18-7-98
"	1990	LL	15-9-97
"	1270	LL	30-7-98

FURTHER PAPERS.

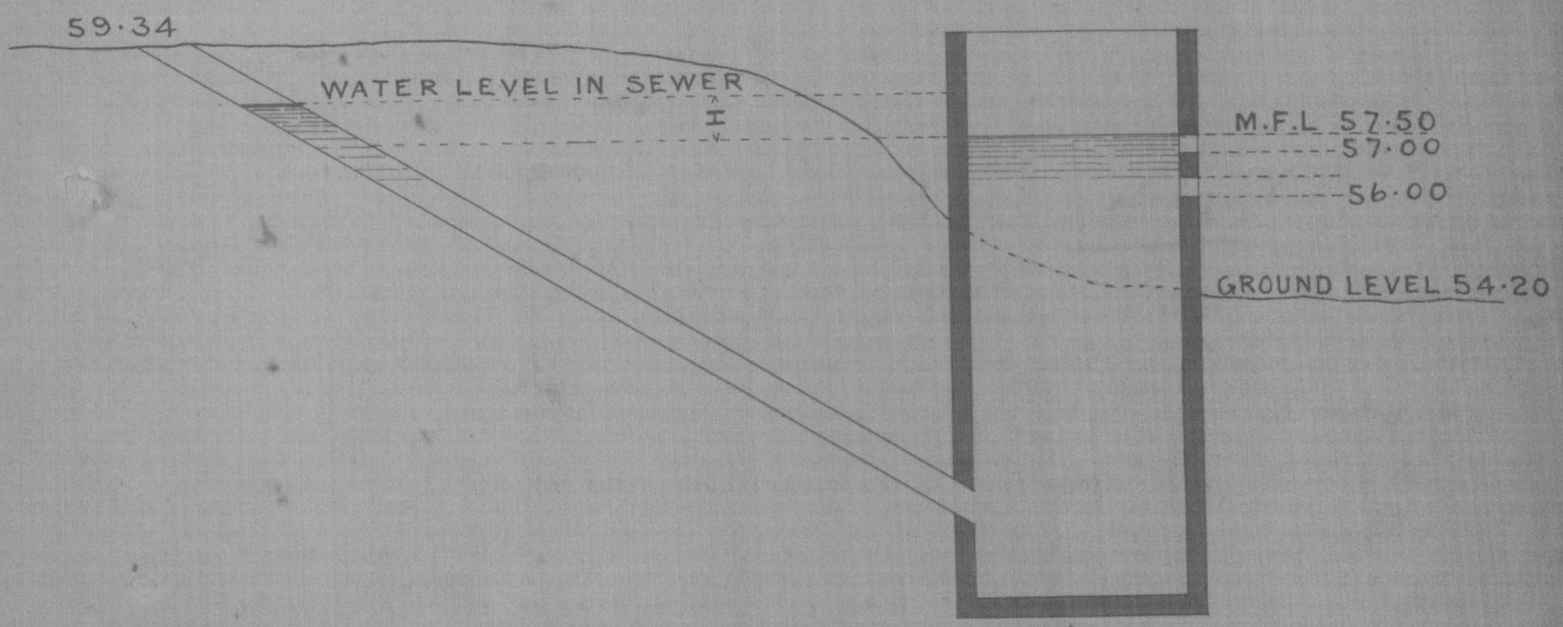
G.O.	No.	Department.	Date.

36

Note by the Assistant Sanitary Engineer to Government.

Reference- Sanitary Board's endorsement No.67/S dated 1st. February 1898 re: the drainage of Shollyappa Moodelly Street.

The undersigned met Mr.O'Connell ,the Executive Engineer, at Kumbakonam ,on 12th.March 1898,and the scheme for the Drainage of Shollyappa Moodelly Street was considered and discussed on the spot. Mr. O'Connell agrees with the undersigned in the conclusion that there would be no advantage in raising the level of the overflow from 56.00 to 57.00, as proposed by Mr.Norfor. .The maximum flood level is 57.50,which Mr.Norfor states is a constant level during the North-East monsoon. This being so,the overflow vent will be drowned during the North-East monsoon, whether the vent is at the level of 56.00 or 57.00. In both cases the discharge from the overflow will be just the same, and will simply depend upon the head" h " which will be the difference of water level in the sewer and the flood level, as shewn in sketch below-



The object of the overflow being to relieve the sewer of internal pressure during the rains, the overflow should be placed as low as possible so as to secure the advantage of a decrease in the internal pressure with the fall in flood level.

2. The Collector in his endorsement No. $\frac{251}{MC}$ of 8th. January 1898, states that one of the objections raised by Mr. Norfor to the overflow at 56.00 is, that, during the rainy season, the drainage from the fields would enter the sewage well, instead of the contents of the sewer finding its way out. This is not so. The ground level where the sewer commences is 59.34 or nearly 2 feet higher than the M.F.L and, as long as the point of entry is higher than the maximum flood level, the overflow is bound to come into operation during the rains. What will happen is that the storm water will back up in the sewer until it attains a head 'h' sufficient to discharge the quantity of water entering the sewer.

3. The statement that the proposed works will result in polluting the Veraha tank is based on a misconception of the scope of the scheme, and an improper knowledge of the conditions under which the tank is now supplied.

4. The Veraha tank receives its supply from the Thepperumanallur channel (marked Ooloor on the plan). This channel is the natural drainage outlet of a large area of land lying between it and the Cauvery, in which not only Shollyappa Moodelly Street but several other streets lie. At present the sewage of all the houses in Shollyappa Moodelly Street, as well as that of the other streets in the drainage area of the Thepperumanallur channel, is discharged into the backyards or ditch drains in streets, where it stagnates and decomposes all during the hot weather. With the first heavy shower the accumalated filth of nine months is washed into the channel and is carried by it to the Veraha tank.

5. When the drainage of Shollyappa Moodelly Street is accomplished as now proposed, the sewage would be filtered, and the affluent would either be used for irrigating the adjoining fields or discharged into the outlet channel. Even in the latter case the quantity of sewage to be dealt with is so small that the affluent would probably dry up in the bed of the channel before it could reach the Veraha tank. The scheme will therefore result in eliminating from the Veraha tank a portion of the impurities that is now contributed to it by Shollyappa Moodelly Street.

6. Mr. Norfor is said to have suggested that the outlet channel be carried further west and joined to another drainage channel, instead of the Thepperumanallur channel. What other channel is not mentioned, but the channel that runs next to the Thepperumanallur channel is the Ooloor channel, which is a feeder to tanks of greater importance than the Veraha tank. If therefore there were any objections to the outlet channel opening into the Thepperumanallur channel, the same objections would apply with greater force to the utilisation of the Ooloor channel.

7. The last question raised by the Collector is whether the scheme for the drainage of Shollyappa Moodelly Street would fit in with any general scheme for the whole town. It is impossible to answer this question definitely without going, to some extent, into the details of a general scheme; but, as far as can be judged at present, the sewer, if laid, as at present designed, will not fit in with the general scheme. The sewer which is 1365 feet in length has a fall of 7.50 feet. This fall will not be admissible in a general scheme. If the probability of the Shollyappa Moodelly Street eventually forming part of a general scheme is to be kept in view, it would be necessary to economise the fall of the sewers as much as possible and this can be done by altering the gradient of the sewers to 1 in 300 as shewn on sheet 2.A. The alteration will, however, entail the cost of the construction of a syphon (₨ 500) across Shollyappa Moodelly Street at the point where the feeder to the Reddy Row tank crosses the street. As altered as above there can be no objection to the scheme either from an engineering or sanitary point of view. The chairman, it is understood, is opposed to the scheme purely on financial considerations. It is urged that the cost of the work is excessive in comparison with the small population that will be benefitted by it.

Office of the Sanitary Engineer,
Fort St. George, 29th. March 1898

Asst. Sanitary Engineer to G[illegible]t

9.02 365 - 1898

9
S.C. No 211 of 98

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1491 m/98

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(41)

S.E./6. 1,000—6-12-97.

No. 365

GOVERNMENT OF MADRAS.

OFFICE OF SANITARY ENGINEER,

Fort St. George, 31st. March 1898.

Despd 1st April 1898

From A.S.Russell Esqr.,
~~J. A. JONES, Esq., MEM. INST. C.E., F.R.S.E.,~~
Ag: SANITARY ENGINEER TO GOVERNMENT,

To
The Secretary, Sanitary Board,
Chepauk.

SIR,

With reference to your endorsement No. 67/S, dated 1st. Ultimo, herewith returned, I have the honor to forward a report, on the whole subject of the Solayappa Mudali street drainage scheme, prepared by the Assistant Sanitary Engineer to Government, after a personal inspection of the locality with Mr. O'Connell, the Executive Engineer.

2. It is obviously not economical to deal separately with the drainage of this one street, as pointed out by the Assistant Sanitary Engineer in para 7 of his report.

3. As regards the scheme itself, the accompanying report enters fully into its merits and defects. It is during the dry weather that the objectionable smells occur, and the scheme will, at such times, be effective in lessening this evil.

I have the honor to be,
Sir,
Your most obedient servant,

A S Russell

Ag: Sanitary Engineer to Government.

$\frac{1}{1491 M/98}$

Government of Madras.

SANITARY BOARD OFFICE.

Proceedings of the Sanitary Board, No. $\frac{265}{5}$, dated Dept.} 28th April '98

Read the following:—

G. O. No. 565 M., dated 14th March 1898.
From the Sanitary Engineer to Government No. 365, dated 31st March 1898.

LOCAL & MUNICIPAL DEPT
No. 1491 M

Resolution

In the first paper read above the Government refers to the Sanitary Board for remarks the proposals for a drainage scheme for the town of Kumbakonam made by the Chairman of the Municipality, and the observations thereon by the Sub-Collector and Collector.

2. The Chairman refers to this matter in para 65 of his report. He there says that the Council has resolved to raise a loan of Rs 35,000 for the purpose of carrying out the following among other Sanitary works.

(1) The Sewage of (a) the Patnulgar quarter.
(b) Solayappa Mudali Street.
(2) Subsidiary drains leading to main drainage channels.

3. He proposes that filters and sewage farms be established in selected blocks of the town as funds become available; the blocks

to be so arranged that they can be afterwards connected by underground pipes with a general sewerage scheme.

4. The Sub Collector agrees with the suggestion of arranging separate blocks, and leaves to the Sanitary Department the duty of seeing that the detached schemes are not mutually inconsistent.

5. The Collector begs to refer to the wider question of the investigation of Water Supply and drainage schemes dealt with in certain references to Government, which are now before the Sanitary Board, and adds that he does not know whether the survey and rough estimate* for the Patnul portion of the town have been made so as to fit in with a general scheme, or whether it provides for open drains or for pipes on the Mylapore drainage system. The matter is one which he considers should be referred to the Sanitary Board for remarks. There is no information on the subject in the Sanitary Board's Office, but in para 3 of the Board's Proceedings No 816/S dated 15th November 1897, the Sanitary Engineer was desired to take up the Patnul drainage scheme as soon as possible, and advise on it, in order that the Board may see whether it can work as a detached item of a general drainage scheme. He is requested to be so good as to report on this point as soon as possible.

*Rs 25,000 as quoted by the Sub-Collector

6. As regards the Solayappa Mudali Street drainage — (1) (6) it is observed that in G.O., No 2232 W., dated 16th August 1897 an estimate amounting to Rs 6,250 was sanctioned for its execution by the Public Works Department, but that the Executive Engineer (Mr Nerfor) subsequently raised some objections to the scheme. These were referred to the Sanitary Engineer who now forwards a report on the whole subject by the Assistant Sanitary Engineer after personal inspection of the locality in company with Mr O'Connell the then Executive Engineer.

in G.O. 1990 M / 15-9-97

7. The report enters fully into the merits and defects of the scheme, and shows (para 7) that it is not economical to deal separately with the drainage of this one street.

8. It would appear that these two sections would alone cost Rs 31,250*, and it is not certain that the detached schemes will work into a general scheme. The Sanitary Board considers that it is a great mistake to design works of this kind piecemeal, and would advise that the Sanitary Engineer be directed to draw up a complete scheme for the drainage of Kumbakonam which, when sanctioned, can be carried out piecemeal as the available funds permit.

*	Rs
Patnul	25,000
Solayappa Mudali Street	6250
	31,250

(True Extract)

R. Sartors.
Secretary, Sanitary Board

Fd

To

The Secretary to Government, Local and Municipal Department — with papers in original + 1 counterfoil of plans.
" Sanitary Commissioner.
" — do — Engineer.

Local & Munl. (1898) Department.

CURRENT No. 1517 M

UNDER SECY. TO GOVT.
30 APR 98

From

The Sanitary Engineer to Govt.,
Fort St. George.

Order

No. 881

Dated 29th April 1898
Received
Registered
Enclosures -"-
Spare copies

SUBJECT,

Water Supply & drainage of Kumbakonam.

Requesting that Government may be pleased to decide, for reasons stated, what works are to be taken in hand towards the ———.

ML 1898 215

BACK PAPERS.

G.O.	No.	Department.	Date.

FURTHER PAPERS.

G.O.	No.	Department.	Date.

S. E. / 6. 1,000—6-12-97.

No. 881

GOVERNMENT OF MADRAS.

OFFICE OF SANITARY ENGINEER,

Fort St. George, 29th April 1898.

LOCAL & MUNICIPAL D.
CURRENT No. 1517 M

From

J. A. JONES, Esq., MEM. INST. C.E., F.R.S.E.,
SANITARY ENGINEER TO GOVERNMENT,

To

The Secretary to Government,
Local and Municipal Department

Cur: 1491 M/98

Go 489 M / 3-3-98

Sir,

With reference to para: No 8 of the Sanitary Board's resolution No $\frac{265}{S}$ of 28.4.98 I have the honor to call attention to this office letter to your address No. 234 dated the 16th February 1898, from which it will be seen that it is impossible for this office to undertake more schemes at present or for some time to come. The water supply scheme for which the Kumbakonam Council granted funds is under survey & that will be proceeded with but there is no advantage whatever in taking up the two schemes of water supply and drainage together, the surveys and levels required for one and the other being of quite a different nature.

now considers it would be a great mis-

2. Apart from this fact, it has been pointed out in this office letter No. 234 already referred to that the cost of a complete scheme for the drainage of Kumbakonam would amount to something like 17 lakhs, while the water supply scheme will cost 5 lakhs.

in G.O. 489 M / 3-3-98

3. I therefore ask, is it in the bounds of possibility, that the Municipal Council even with the most liberal aid from Government, an aid which, in present circumstances, is unlikely to be tendered, will, within the next quarter of a century be able to undertake both schemes; I doubt if they will be able to undertake even the smaller one, the water supply.

4. Presuming that Government will concur in this view, it may then be asked whether the two particularly bad portions of Kumbakonam are to have no remedies supplied during a period which will certainly be long if not so long as stated.

5. Until the larger scheme is designed & for this Rs 3,000 is required, it is impossible to distinctly state whether the smaller schemes will fit in it, with it

but

but my belief is that they will not and that they could not be arranged to do so.

6. It therefore seems to me & I regret to differ from the Sanitary Board that the proper course is to proceed with the small schemes where relief is urgently wanted.

7. Soliappa Mudali street has been delayed because of certain objections and criticisms by the late Executive Engineer, P.W.D., but which as will be seen from the report of the Assistant Sanitary Engineer (Vide para 6 of the Sanitary Board's resolution under reference) really do not affect the value of the scheme, the only possible one and one approved by the Sanitary Commissioner.

Patnul street drainage.

8. As to the other scheme, it is being investigated, but it has only been taken up lately as opportunity permitted but looking to the opinion expressed in para 8 of the Sanitary Board's resolution, I have withdrawn the officer who was investigating it from Kumbakonam. I would add that the Sanitary Board required the preparation of this Patnul scheme, which the Board now considers it would be a great mist

to design.

9. As constant change of policy leads to great expense & waste of labor, I have the honor to request that Government will be pleased to decide (1) whether the water supply now being investigated is to precede drainage investigation, (2) whether the large drainage scheme is to be investigated at all (3) whether small schemes may not be prepared for temporary alleviation of the worst parts of the town & (4) whether the Soliappa Mudali street scheme may not now be begun & handed over to this department for execution

I have the honor to be,
Sir,
Your most obedient servt

Sanitary Engineer to Govt.

Local & Munl. (1898) Department.

CURRENT No. 1766M

Order

From
The Sanitary Commissioner
for Madras.

No. 1127/S

Dated 20th May 1898.
Received
Registered
Enclosures
Spare copies.

SUBJECT.

Offering his opinion with reference to the Resolution of the Sanitary Board No 265 dated 28th april 1898 regarding Kumbaconam Drainage scheme.

27.5.98

BACK PAPERS.

G.O.	No.	Department.	Date.

FURTHER PAPERS.

G.O.	No.	Department.	Date.

51

No. 1127/S

OFFICE OF SANITARY COMMISSIONER,
Fort St. George, 20th May 1898.

LOCAL & MUNICIPAL DEPT.
CURRENT No. 1766M

From

SURGEON-LIEUT.-COL. W. G. KING, M.B., C.M., D.P.H.,
SANITARY COMMISSIONER FOR MADRAS,

To

THE Secretary to Government,
Local and Municipal department,
Fort Saint George.

lost.

SIR,

With reference to the Resolution by the Sanitary Board No 266, dated 28th April 1898, I have the honor to state that as, contrary to what I believe is the intention of Government in reference to its functions, I was not consulted by that body before their advising Government upon so important a sanitary measure, I wish to place the following opinion upon record founded upon such evidence as is available to me.

2. I consider that the introduction of a water supply scheme into Kumbakonam is of the first sanitary importance.

3. The introduction of a sewerage scheme is also of importance, but if, on account of financial conditions, only one scheme be feasible at present, that for water supply certainly

should have the preference. Pending the possibility of introducing a correct sewerage scheme in any part of the town, I believe the proposal of the Chairman to form small sewage cultivation plots and to use sewage filtration at certain points, judicious and suitable, and in accord with the best sanitary teaching; but such methods should be effected in a mere make-shift manner, and have no relation to any future general schemes. Under one condition only would I approve of the method of using partial schemes to be ultimately joined up as suggested by the Board, namely, if conservancy be combined with this scheme as the primary point sought, so as to serve the entire town. This in Kumbakonam would be possible by the use of the Shone's pneumatic system combined with pail depôts. — From consultation with Mr Ault on the adaptability of the Shone's system of sewerage for conservancy as the prime object with the gradual addition of sewage as parts of the town are drained, I believe that this method could be worked with economy, and would suit native requirements.

I have the honour to be,
Sir,
Your most obedient Servant
W G King
Surgn Lieut Col
Sanitary Commr of Madras

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en copied } 190 .
examined
en signed

AGAIN G.O., No. , DATED
190 .

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ENCLOSURES TO C. No.

ORDER OF GOVERNMENT .. .. .. A A A A A A A

LETTER OF GOVERNMENT.

STATEMENT WITH DITTO.

PAPERS NOT FILED UP, BEING MEANT FOR DESPATCH IN ORIGINAL.

N.B.—
A = Copy in full.
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