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## MADRAS RECORD OFFICE.

**Government of Madras.**

*Public works* **DEPARTMENT.**

|          |     |       |
|----------|-----|-------|
| G.O. No. | 95  | Press |
| 183-184  |     | Mis.  |
| Dated    | 11- | 1873. |

Not to be folded or roughly handled

31-3

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11

*Proceedings of the Madras Government, Public Works Department,*  
*11th January 1873.*

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No. 183. Read the following Endorsement of the Military Department, dated Fort St. George, 6th January 1873 :—

From the Officiating Quartermaster-General, to the Secretary to Government, Public Works Department, dated Fort St. George, 4th January 1873, No. 31.

I HAVE the honour to transmit, with the approval of His Excellency the Commander-in-Chief, the accompanying plan and estimate, the latter, amounting to Rupees 24,150, for constructing a Government Bakery at Bangalore.

2. The plan and estimate in question are forwarded direct at the request of the District Engineer, Bangalore, to save time that the grant allotted to the work may not lapse.

TRANSFERRED to the Public Works Department.

(Signed) A. C. SILVER, Colonel,  
*Officiating Secretary to Government.*

No. 184. ORDER THEREON, 11th January 1873, No. 95.

MILITARY WORKS, No. 3.

THE estimate of Rupees 24,150, for the construction of the Government Bakery at Bangalore, is sanctioned. It

is understood that the plan and estimate have been approved by the Inspecting Engineer for Buildings.

2. The work should be proceeded with vigorously to ensure the utilization of the current year's grant.

(True Extract.)

(Signed) G. W. WALKER, Colonel, R.E.,  
*Secretary to Government.*

To the Inspecting Engineer for Buildings.

„ District Engineer, Bangalore.

„ Military Department.

„ Controller of Public Works Accounts.

164 of 1872/73 Lij

Estimate of the probable cost of constructing  
Government Bakery at Bangalore.

| Particulars of Work                       | No. | Measurement |    |   | Content | Total  |
|-------------------------------------------|-----|-------------|----|---|---------|--------|
|                                           |     | L           | B  | H |         |        |
| <u>Concrete</u>                           |     |             |    |   |         |        |
| Long walls of central portion             | 2   | 204         | 4  | 2 | 3264    |        |
| Cross walls of ——— D <sub>2</sub> ———     | 3   | 28          | 4  | 2 | 672     |        |
| Front and rear walls of End rooms         | 4   | 46          | 4  | 2 | 1472    |        |
| End walls of ——— D <sub>2</sub> ———       | 4   | 38          | 4  | 2 | 1216    |        |
| Cross walls of ——— D <sub>2</sub> ———     | 2   | 38          | 3½ | 2 | 532     |        |
| Partition wall ——— D <sub>2</sub> ———     | 1   | 17½         | 3½ | 2 | 120¾    |        |
| Long walls of Verandah central portion    | 2   | 188         | 4  | 2 | 3008    |        |
| Front and rear walls of verandah          |     |             |    |   |         |        |
| (End rooms) ———                           | 4   | 70          | 4  | 2 | 2240    |        |
| End walls of ——— D <sub>2</sub> ———       | 2   | 62          | 4  | 2 | 992     |        |
| ——— D <sub>2</sub> ——— D <sub>2</sub> ——— | 4   | 1           | 4  | 2 | 32      |        |
| Cross walls ——— D <sub>2</sub> ———        | 8   | 8           | 4  | 2 | 512     |        |
| Total Cft. of concrete                    |     |             |    |   |         | 14060¾ |

Foundation

|                                                                      |    |                 |                |   |                    |
|----------------------------------------------------------------------|----|-----------------|----------------|---|--------------------|
| Long walls of Central portion                                        | 2  | $20\frac{3}{4}$ | $3\frac{1}{4}$ | 4 | 5323 $\frac{1}{2}$ |
| Gross walls of _____ D <sup>o</sup> _____                            | 3  | $28\frac{3}{4}$ | $3\frac{1}{4}$ | 4 | 1121 $\frac{1}{4}$ |
| Front and rear walls of (End<br>rooms) _____                         | 4  | $45\frac{1}{4}$ | $3\frac{1}{4}$ | 4 | 2353               |
| End walls of _____ D <sup>o</sup> _____                              | 4  | $38\frac{3}{4}$ | $3\frac{1}{4}$ | 4 | 2015               |
| Gross walls of _____ D <sup>o</sup> _____                            | 2  | $38\frac{3}{4}$ | $2\frac{3}{4}$ | 4 | 852 $\frac{1}{2}$  |
| Partition wall of _____ D <sup>o</sup> _____                         | 1  | 18              | $2\frac{3}{4}$ | 4 | 198                |
| Side walls of kitchen D <sup>o</sup> _____                           | 3  | $20\frac{1}{4}$ | $2\frac{1}{4}$ | 2 | 91 $\frac{1}{8}$   |
| Long walls of Verandah -<br>(central portion) _____                  | 2  | $18\frac{1}{4}$ | $3\frac{1}{4}$ | 4 | 4868 $\frac{1}{2}$ |
| Front and rear walls of D <sup>o</sup> _____<br>(End rooms) _____    | 4  | $69\frac{1}{4}$ | $3\frac{1}{4}$ | 4 | 3601               |
| End walls of _____ D <sup>o</sup> _____ D <sup>o</sup> _____         | 2  | $62\frac{3}{4}$ | $3\frac{1}{4}$ | 4 | 1631 $\frac{1}{2}$ |
| _____ D <sup>o</sup> _____ D <sup>o</sup> _____ D <sup>o</sup> _____ | 4  | $1\frac{3}{4}$  | $3\frac{1}{4}$ | 4 | 91                 |
| Gross walls of Verandah _____                                        | 8  | $8\frac{3}{4}$  | $3\frac{1}{4}$ | 4 | 910                |
| Steps _____                                                          | 6  | $10\frac{1}{2}$ | 3              | 1 | 189                |
| _____ D <sup>o</sup> _____                                           | 4  | $8\frac{1}{2}$  | 3              | 1 | 102                |
| _____ D <sup>o</sup> under flue _____ D <sup>o</sup> _____           | 12 | $3\frac{1}{4}$  | $2\frac{1}{2}$ | 2 | 195                |

Total cft of foundation stone in chunam  $23542\frac{3}{8}$

| Particulars of work                             | No | Measurement                          | Content | Total             |
|-------------------------------------------------|----|--------------------------------------|---------|-------------------|
| <u>Basement</u>                                 |    |                                      |         |                   |
| Long walls of central portion                   | 2  | $205\frac{1}{2} \times 2\frac{1}{2}$ | 2       | 2055              |
| cross walls of —————                            | 3  | $29\frac{1}{2} \times 2\frac{1}{2}$  | 2       | 442 $\frac{1}{2}$ |
| Front and rear wall of End room                 | 4  | $44\frac{1}{2} \times 2\frac{1}{2}$  | 2       | 890               |
| End walls of —————                              | 4  | $39\frac{1}{2} \times 2\frac{1}{2}$  | 2       | 790               |
| cross walls of —————                            | 2  | $39\frac{1}{2} \times 2$             | 2       | 316               |
| Partition wall —————                            | 1  | $18\frac{3}{4} \times 2$             | 2       | 75                |
| Side wall of kitchen —————                      | 2  | $20\frac{3}{4} \times 1\frac{3}{4}$  | 2       | 72 $\frac{5}{8}$  |
| Long walls of verandah central portion          | 2  | $186\frac{1}{2} \times 2\frac{1}{2}$ | 2       | 1865              |
| Front and rear walls of under verandah End room | 4  | $68\frac{1}{2} \times 2\frac{1}{2}$  | 2       | 1370              |
| End walls of —————                              | 2  | $63\frac{1}{2} \times 2\frac{1}{2}$  | 2       | 635               |
| —————                                           | 4  | $2\frac{1}{2} \times 2\frac{1}{2}$   | 2       | 50                |
| cross walls of verandah —————                   | 8  | $9\frac{1}{2} \times 2\frac{1}{2}$   | 2       | 380               |
| Steps —————                                     | 6  | $10 \times 3\frac{1}{2}$             |         | 90                |
|                                                 | 6  | $8 \times 2\frac{1}{2}$              |         | 48                |
|                                                 | 6  | $6 \times 1\frac{1}{2}$              |         | 18                |
| Steps —————                                     | 4  | $8 \times 3\frac{1}{2}$              |         | 48                |
|                                                 | 4  | $6 \times 2\frac{1}{2}$              |         | 24                |
|                                                 | 4  | $4 \times 1\frac{1}{2}$              |         | 8                 |
| — D <sup>o</sup> under flue —————               | 12 | $3\frac{1}{4} \times 2$              | 2       | 156               |
| Total cft. of Basement Stone in Chumam          |    |                                      |         | 9333-             |

# Particulars of Work

Measurement  
L B D Content Total

## Superstructure

|                                                                |       |        |       |        |         |
|----------------------------------------------------------------|-------|--------|-------|--------|---------|
| Long walls of central portion                                  | 2     | 206    | 2     | 16     | 13184   |
| Cross walls of ——— D <sub>2</sub> ———                          | 3     | 30     | 2     | 16     | 2880    |
| Gable over ——— D <sub>2</sub> ——— D <sub>2</sub> ———           | 1     | 30     | 2     | 5      | 300     |
| Front and rear walls of end rooms                              | 4     | 44     | 2     | 16     | 5632    |
| End walls of ——— D <sub>2</sub> ———                            | 4     | 40     | 2     | 16     | 5120    |
| Cross walls of ——— D <sub>2</sub> ———                          | 2     | 40     | 1 1/2 | 15     | 1800    |
| Partition wall ——— D <sub>2</sub> ———                          | 1     | 19 1/4 | 1 1/2 | 15     | 433 1/8 |
| Side walls of kitchen (end room)                               | 2 1/4 | 1 1/4  | 3     |        | 19 1/16 |
| Long walls of verandah central portion                         | 2     | 186    | 2     | 11 1/2 | 8556    |
| Front and rear walls of verandah end rooms                     | 4     | 68     | 2     | 11 1/2 | 6256    |
| End walls of ——— D <sub>2</sub> ——— D <sub>2</sub> ———         | 2     | 64     | 2     | 11 1/2 | 2944    |
| ————— D <sub>2</sub> ——— D <sub>2</sub> ——— D <sub>2</sub> ——— | 4     | 3      | 2     | 11 1/2 | 216     |
| Cross walls of verandah                                        | 8     | 10     | 2     | 11 1/2 | 1840    |
| Plinth to piers 3 ft. ———                                      | 46    | 7 1/2  | 1/4   | 1/2    | 42 1/8  |
| ————— D <sub>2</sub> ——— D <sub>2</sub> ——— 4 ft. ———          | 8     | 8 1/2  | 1/4   | 1/2    | 8 1/2   |
| ————— D <sub>2</sub> ——— corner ———                            | 4     | 12 3/4 | 1/4   | 1/2    | 6 3/8   |
| ————— D <sub>2</sub> ——— D <sub>2</sub> ———                    | 4     | 15     | 1/4   | 1/2    | 7 1/2   |

## Upper Story

Front and rear walls of

Machinery and office ——— 4 24 2 11 2112

End walls of ——— D<sub>2</sub> ——— 4 30 2 11 2640

Total Superstructure 54119 9/32

# Particulars of Work

Measurement  
L B D Content Total

## Deduction from Superstructure

|                                            |     |       |             |       |         |
|--------------------------------------------|-----|-------|-------------|-------|---------|
| Doors                                      | 18  | 4     | 2           | 8     | 1152    |
| — D <sub>2</sub> — { Semi circular portion | 18  | 6 1/4 | area 2      |       | 225     |
| — D <sub>2</sub> — { Arch work             | 18  | 8 5/8 | 2 1 1/2     |       | 465 3/4 |
| Windows                                    | 13  | 4     | 2           | 4     | 416     |
| — D <sub>2</sub> — { Semi circular portion | 13  | 6 1/4 | area 2      |       | 162 1/2 |
| — D <sub>2</sub> — { Arch work             | 13  | 8 5/8 | 2 1 1/2     |       | 336 3/8 |
| Doors                                      | 3   | 4     | 1 1/2       | 8     | 144     |
| — D <sub>2</sub> — { Semi circular portion | 3   | 6 1/4 | area 1 1/2  |       | 28 1/8  |
| — D <sub>2</sub> — { Arch work             | 3   | 8 5/8 | 1 1/2 1 1/2 |       | 58 7/32 |
| Doors to kneading room                     | 4   | 4     | 2           | 7     | 224     |
| — D <sub>2</sub> — { Semi circular portion | 4   | 6 1/4 | area 2      |       | 50      |
| — D <sub>2</sub> — { Quoin Stones          | 52  | 1 1/2 | 2           | 3/4   | 117     |
| — D <sub>2</sub> — { Quoin Stones          | 56  | 1     | 2           | 3/4   | 84      |
| Windows to kneading room                   | 11  | 4     | 2           | 4     | 352     |
| — D <sub>2</sub> — { Semi circular portion | 11  | 6 1/4 | area 2      |       | 137 1/2 |
| — D <sub>2</sub> — { Quoin Stones          | 99  | 1 1/2 | 2           | 3/4   | 222 3/4 |
| — D <sub>2</sub> — { Quoin Stones          | 110 | 1     | 2           | 3/4   | 165     |
| Stones for window sills                    | 11  | 7     | 2           | 3/4   | 115 1/2 |
| Windows                                    | 24  | 3     | 2           | 1 1/2 | 216     |

Carried over 4671 23/32

# Particulars of Work

Measurement  
No. L B D Content Total

|                                 |              |    |   |    |      |
|---------------------------------|--------------|----|---|----|------|
| Deduction (cd)                  | Brought over | 46 | 1 | 32 |      |
| Lintel Stone over attic windows | 24           | 4  | 2 | 3  | 72   |
| Arch ways to central portion    | 12           | 6  | 2 | 6  | 864  |
| — { Semi circular portion       | 12           | 14 | 8 | 2  | 539  |
| — { Arch work                   | 12           | 11 | 3 | 2  | 483  |
| — to End rooms                  | 1            | 6  | 1 | 2  | 54   |
| — { Semi circular portion       | 1            | 14 | 8 | 1  | 213  |
| — { Arch work                   | 1            | 11 | 3 | 1  | 268  |
| — to Verandah                   | 60           | 6  | 2 | 6  | 4320 |
| — { Semi circular portion       | 60           | 14 | 8 | 2  | 1695 |
| — { Arch work                   | 60           | 11 | 3 | 2  | 2115 |
| —                               | 8            | 5  | 2 | 6  | 480  |
| — { Semi circular portion       | 8            | 9  | 3 | 4  | 156  |
| — { Arch work                   | 8            | 10 | 3 | 2  | 246  |

## Upper Story

|                               |   |   |   |   |     |
|-------------------------------|---|---|---|---|-----|
| Doors to Machinery and Office | 4 | 4 | 2 | 7 | 224 |
| — { Semi circular portion     | 4 | 6 | 4 | 2 | 50  |
| — { Arch work                 | 4 | 8 | 5 | 2 | 103 |
| Windows to —                  | 8 | 4 | 2 | 4 | 256 |
| — { Semi circular portion     | 8 | 6 | 4 | 2 | 100 |
| — { Arch work                 | 8 | 8 | 5 | 2 | 207 |

Total Deduction 16423 <sup>2</sup>/<sub>32</sub>

Total cft. of Superstructure Stone in Chumam 37695 <sup>23</sup>/<sub>32</sub>

— D<sub>2</sub> — D<sub>2</sub> Stock on hand 13832

# Particulars of Work

Measurement  
No. L B D Content Total

## Brick in Chumam

9

|                                                             |      |     |   |   |   |                                 |                                |
|-------------------------------------------------------------|------|-----|---|---|---|---------------------------------|--------------------------------|
| Parapet over long walls of verandah central portion         | 2    | 18  | 6 | 2 | 1 | 744                             | 16 <sup>2</sup> / <sub>3</sub> |
| — D <sub>2</sub> front and rear walls of verandah End rooms | 4    | 6   | 8 | 2 | 1 | 544                             | 2                              |
| — D <sub>2</sub> end walls                                  | 2    | 6   | 4 | 2 | 1 | 256                             | 26                             |
| — D <sub>2</sub> — D <sub>2</sub> — D <sub>2</sub>          | 4    | 3   | 2 | 1 |   | 24                              | 99                             |
| Side wall of flue behind the ovens                          | 1    | 24  | 5 | 1 | 1 | 53 <sup>1</sup> / <sub>32</sub> | 110                            |
| — D <sub>2</sub> — D <sub>2</sub> to Chimney                | 2    | 15  | 1 | 2 | 3 | 135                             | 24                             |
| Filling in over Crown of arch under flue behind the ovens   | 1    | 122 | 3 | 4 | 1 | 594 <sup>3</sup> / <sub>4</sub> |                                |
| Wall around the boiler                                      | 5    | 9   | 1 | 2 |   | 177                             |                                |
| Total cft. of Brick in Chumam                               | 3011 |     |   |   |   | 25 <sup>5</sup> / <sub>32</sub> |                                |

## Arch work Stone in Chumam

|                                   |    |    |   |   |   |   |                                    |
|-----------------------------------|----|----|---|---|---|---|------------------------------------|
| Over Doors                        | 19 | 8  | 5 | 2 | 1 | 2 | 491 <sup>5</sup> / <sub>8</sub>    |
| — D <sub>2</sub>                  | 3  | 8  | 5 | 1 | 2 | 1 | 58 <sup>1</sup> / <sub>32</sub>    |
| Windows                           | 13 | 8  | 5 | 2 | 1 | 2 | 336 <sup>3</sup> / <sub>8</sub>    |
| Arch ways to central portion      | 12 | 11 | 3 | 2 | 1 | 2 | 423                                |
| — D <sub>2</sub> to End rooms     | 1  | 4  | 3 | 4 | 1 | 2 | 26 <sup>7</sup> / <sub>16</sub>    |
| — D <sub>2</sub> to Verandahs     | 54 | 11 | 3 | 2 | 8 | 1 | 2022 <sup>15</sup> / <sub>32</sub> |
| — D <sub>2</sub> — D <sub>2</sub> | 6  | 11 | 3 | 2 | 1 | 2 | 211 <sup>1</sup> / <sub>2</sub>    |
| — D <sub>2</sub> — D <sub>2</sub> | 8  | 10 | 3 | 2 | 8 | 1 | 261 <sup>3</sup> / <sub>8</sub>    |
| Doors to Office & Machinery room  | 4  | 8  | 5 | 2 | 1 | 2 | 103 <sup>1</sup> / <sub>2</sub>    |
| Windows to — Upper Story          | 8  | 8  | 5 | 2 | 1 | 2 | 207                                |

Total cft. of Arch work Stone in Chumam 4141 <sup>1</sup>/<sub>2</sub> 0

— D<sub>2</sub> — D<sub>2</sub> Stock in hand 3406

Particulars of work

No: Measurement.

L B D Content Total

Arch work brick in chumam

Over flue behind the ovens — 1 122 2 1/4 1 1/4 419 3/8

— — — to chimney — 1 15 7 1 1/2 15 1/2

Arches under flue — 12 15 3 1/4 1 1/4 721 1/4

Total cft. of Arch work brick in chumam 1308 1/8

Brick in clay

Foundation to cross walls of — — — — —

Ovens — 11 12 1/4 2 1/2 2 1/2 167 3/4

Basement to — — — — 11 12 1/4 2 2 139

Side walls to ovens — 1 120 7 1/2 3 1/4 94 1/2

Filling in between arches

under ovens — 1 120 12 1/4 7 1/4 70 3/4

— — — between ovens — 1 120 10 3/4 1 1/4 16 1/2

Flue to ovens — 12 12 1/4 3 3/4 3 3/4 183 1/2

Total cft. of Brick in clay — 345 11/16

Arch work brick in clay

Arches under ovens — 12 11 12 1/4 1 1/4 1819 3/8

Total cft. of Arch work brick in clay — 1819 3/8

Fire brick in fire clay

Bottom of ovens — 12 70 4 1/2 4 1/2 315

Side wall to ovens — 12 25 3/4 1/2 112 1/2

Total cft. of fire brick in fire clay — 427 1/2

Particulars of work

Measurements

L B & Content Total

Arch work

Bricks to ovens 12 (51.39) 616  $\frac{2}{3}$

Total cft. of Arch work fire brick in fire clay 616  $\frac{2}{3}$

of Lamin Stones for doors 52 1  $\frac{1}{2}$  2  $\frac{1}{8}$   $\frac{3}{4}$  52 52

— D<sub>2</sub> — D<sub>2</sub> — 56 1 2  $\frac{1}{8}$   $\frac{3}{4}$  56 56

— D<sub>2</sub> — D<sub>2</sub> for windows 99 1  $\frac{1}{2}$  2  $\frac{1}{8}$   $\frac{3}{4}$  99 99

— D<sub>2</sub> — D<sub>2</sub> — D<sub>2</sub> — 110 1 2  $\frac{1}{8}$   $\frac{3}{4}$  110 110

— D<sub>2</sub> Stones for window sills 11 7 2  $\frac{1}{8}$   $\frac{3}{4}$  11 11

— D<sub>2</sub> Lintel stone over attic windows 24 4  $\frac{1}{2}$  2  $\frac{1}{3}$  24 24

Cornice

Long wall of central portion 2 206 . . 4 12

Front & rear walls of End rooms 4 45 . . 180

End walls of verandah — do — 2 45 . . 90

— D<sub>2</sub> — D<sub>2</sub> — 4 5 . . 20

Long wall of verandah —

— central portion — 2 182 . . 364

Front & rear walls of D<sub>2</sub> End rooms 4 69 . . 276

End rooms — D<sub>2</sub> — 2 69 . . 138

— D<sub>2</sub> — D<sub>2</sub> — 4 5 . . 20

Upper Story

Front & rear walls of Machi —

— and Office — 4 25 . . 100

End walls — D<sub>2</sub> — 4 35 . . 140

Total Rft. of cornice work 1740

# Particulars of work

Measurements  
No. L B D Content Total

## Steps

|   |   |    |    |    |
|---|---|----|----|----|
| — | 6 | 6  | 36 | 36 |
| — | 6 | 10 | 60 | 60 |
| — | 6 | 14 | 84 | 84 |
| — | 4 | 4  | 16 | 16 |
| — | 4 | 8  | 32 | 32 |
| — | 4 | 12 | 48 | 48 |

Total Rft of Stone slabs tread for steps 276

## Parapets

Over front and rear wall of

Machinery and Office — 4 24 . 96

End walls — 4 30 . 120

Total Rft of Ornamental Parapets — 216

## Plastering

Over room — 1 30 . 16 4800

— 1 140 . 16 2240

Gable wall both sides — 2 30 . 5 300

Office & Machinery room — 2 100 . 27 5400

End rooms — 1 155½ . 16 2488

— 1 157 . 16 2512

Cross walls to End rooms both sides 4 40 . 15 2400

Partition wall — 2 19½ . 15 57½

Carried over — 20717½

# Particulars of work

Measurements  
No. L B D Content Total

## Plastering (ct)

Brought over — 20717½

Knecading room — 344 . 11½ 3956

Parapet over long wall of

verandah central

portion — 2 186 . 3½ 1302

— 10 front and rear walls of

End rooms — 4 68 . 3½ 952

— 2 End wall — 2 64 . 3½ 448

— 4 3 . 3½ 42

Arches and soffits of arch

ways between ovens and

Knecading room — 12 21½ . 2 516

Around the flue behind the ovens 1 122 . 11 1342

— 1 15 . 12 180

Total — 29455½

## Deduction

Arch ways both side — 24 6 . 6 864

— 24 14½ area . 339

Total Deduction — 1203

Total sqrs of Plastering with two coats of

Chunam — 28252½

Total sqrs of Whitewashing two coats — 28252½

## Particulars of Work

Measurements  
R: L B & Content Total.

Dressing

*(Signature)*

Dressing (10/2/1963)  
 Fare and off of archestoverland 10.00 1/2 1/2 1/2  
 — Dr — Dr — 10.00 1/2 1/2 1/2  
 Total sqt. of Dressing 19.63

Printing

Long wall of verandah out - one wall brick, other 2

= side Central portion ——— 2 182 11 4004

Real verandah inside Dr. — 1 244 11½ 3956

Front, rear and end walls of

Veranda End Room — 668 : 11,4488

Cond. — Dr. — Dr. — 482: 11.22

Around the front and rear connected across

verandah of office and

Machinery room inside - 4.70 x 11.5 8220

Long walls of ventral portion

over the terrace. \_\_\_\_\_ 2 162.  $2\frac{3}{4}$  891.

Wall around the End rooms - 2 142 - 1 1/2 49

Upper story - no slaying bed

Front and rear wall of Office 74 24 - 14 1/2 - 14 1/2

End Walls \_\_\_\_\_ Machinery } 434 . 11½ 1564

Jambos & soffits of verandah arches 60  $2\frac{1}{2}$  . 2580

— D<sub>1</sub> — D<sub>2</sub> — 8 197. 2 316

|                              |     |   |      |
|------------------------------|-----|---|------|
| Basement around the building | 795 | 2 | 1590 |
|------------------------------|-----|---|------|

Total 32010

## Particulars of Work

| Measurements |                      |
|--------------|----------------------|
| No.          | L B Dr Content Total |
|              | 15                   |

Education from painting

Went to kneading room — 4 4 " 7 112

3 1/2 biennial portion ————— 4  $8\frac{5}{8}$  years = 34

D. to End rooms and Office— 11 4 6 8 35

*D. bicircularis* 11 85oria. 94-

|         |    |   |   |   |     |
|---------|----|---|---|---|-----|
| Windows | 24 | 4 | " | 4 | 384 |
|---------|----|---|---|---|-----|

*Dr. L. L. L.*

|            |                |                   |   |    |            |     |
|------------|----------------|-------------------|---|----|------------|-----|
| -          | N <sup>y</sup> | Purendas per hon. | — | 24 | o/g Area " | 28, |
| Draft will | It             |                   |   | 1  | "          | the |

Down to Upper story — 4 4 . 7 112

7.3 Circular portion —  $4 \frac{7}{8}$  area. 34

Windows to D: \_\_\_\_\_ 84.4.128

2. Bi circular portion —  $8 \frac{8}{7}$  area. 64

1891-92

|                    |    |   |                     |     |
|--------------------|----|---|---------------------|-----|
| total high windows | 24 | 3 | $\cdot \frac{1}{2}$ | 108 |
|--------------------|----|---|---------------------|-----|

Sketchways to Vera Cruz both sides 120 6 . 6 432

Do<sup>3</sup> Semi circular portion 120 14<sup>1</sup>/<sub>8</sub> area. 169.

11/5/64

\_\_\_\_\_

16  $9\frac{3}{4}$  area. 156

Space occupied by bluebeams

## Particulars of Work

No. *Measurements*  
L B D Contain Total

Woodwork

|                                           |     |        |       |       |             |
|-------------------------------------------|-----|--------|-------|-------|-------------|
| Hip rafters                               | 4   | 25     | 8     | 7 1/2 | 25-2-1      |
| Purlins                                   | 2   | 151    | 6     | 6     | 75-6-       |
| Ends                                      | 2   | 16     | 6     | 6     | 8-          |
| Ridge pole                                | 1   | 136    | 3 1/2 | 8     | 26-5-4      |
| Brackets                                  | 32  | 3/4    | 5     | 6     | 5-          |
| Wall plates                               | 2   | 162    | 4     | 2     | 18-         |
| Do                                        | 2   | 30     | 4     | 2     | 3-4-        |
| Common rafters                            | 178 | 17 1/8 | 3     | 6     | 425-6-7 1/2 |
| Hip rafters                               | 4   | 25     | 3     | 6     | 12-6-       |
| Jack rafters                              | 74  | 10 1/2 | 3     | 6     | 9-1-6-      |
| Beams to Office and Machinery             | 6   | 22     | 10    | 15    | 13-6-       |
| Boarding to Do                            | 2   | 30     | 20    | 3     | 300-4-      |
| Beams to Do Upper Story                   | 4   | 22     | 10    | 15    | 91-8-       |
| Joists to Do Do                           | 28  | 32     | 3     | 6     | 112-        |
| Wall plates to Do                         | 4   | 20     | 4     | 2     | 4-5-4       |
| Joists to Kneading room and rear verandah | 218 | 11 1/2 | 3     | 6     | 313-4-6     |
| Wall plates to Do                         | 4   | 162    | 14    | 2     | 36-         |

Carried over 1691-7 1/2

## Particulars of Work

Measurements  
No. L B D Content Total

Woodwork (cb)

Brought over 17 1691-7-12

|                                                                   |     |     |    |    |         |
|-------------------------------------------------------------------|-----|-----|----|----|---------|
| Bressummers to front and rear verandah of office & machinery room | 4   | 11½ | 6  | 9" | 17-3-   |
| Joists to — Do: —                                                 | 28  | 11½ | 3" | 6" | 40-3-   |
| Wall plates to Do: —                                              | 28  | 16½ | 3" | 6" | 57-9-   |
| Joists to verandah End rooms                                      | 200 | 11½ | 3" | 6" | 287-6-  |
| Bressummers to Do: —                                              | 4   | 11½ | 6  | 9" | 17-3-   |
| Wall plates to Do: —                                              | 2   | 296 | 4" | 2" | 32-10-8 |
| Bressummers to front and rear verandah of machinery               | 4   | 25  | 4¼ | 6" | 17-8-6  |
| Rafters to — Do: —                                                | 68  | 13¾ | 3" | 5" | 97-4-9  |
| Wall plates —                                                     | 4   | 24  | 4" | 2" | 5-4-    |

5/12/11 — Total cft. of Wood work — 2273-98½

N<sup>o</sup> of nails & long ————— 978 978 978

## Roofing

|                       |   |     |    |      |
|-----------------------|---|-----|----|------|
| Order Central portion | 2 | 162 | 20 | 6480 |
| End roofs             | 2 | 102 | 25 | 5100 |

Total sqs of Roofing with  $\frac{1}{2}$  new teak  
wood sleepers one course of flat tiles and  
two courses of pan tiles and Chumam border,  
6 ft apart and 9" in breadth. 115.80

# Particulars of work

Measurements  
N<sup>o</sup> L B D Content Total

Rft of Ridge ventilators — 1 135 1/2 135 1/2  
N<sup>o</sup> of Refixing the two end  
roofs — 2 2 2

N<sup>o</sup> of Trusses with iron work  
See Complete — 14 14 14

D<sup>o</sup> Trusses to support hip rafters — 2 2 2

## Serracing

Kneading room & rear verandah 2 16 1/2 11 1/2 3760 1/2

Front and rear verandah of { 4 10 3/4 11 1/2 494 3/4

Machinery and office room { 4 10 3/4 16 1/2 709 1/2

Front & rear verandah of end rooms 4 53 1/2 11 1/2 2461

End — D<sup>o</sup> — 2 42 1/2 11 1/2 977 1/2

## Upper Story

Machinery and Office — 2 31 1/2 21 1/2 1354 1/2

Total sqrs of Serracing — 975 1/2

## Semiterracing

Over front and rear verandah  
of machinery and office

Upper Story — 4 24 1/2 13 1274

Total sqrs of Semiterracing with  
four courses of flat tiles and 3 coats of  
Plastering — 1274

# Particulars of work

Measurements  
N<sup>o</sup> L B D Content Total

N<sup>o</sup> of columns 1 1/2 feet diameter and  
10 feet high with plastering complete 16 10 16 16

Rft of wrought iron spouts 3 inner  
diameter and 7/8 thick — 38 1/2 646 646

## Wood oiling

Hip rafters — 4 25 15 1/8 162 1/2

Purlins — 2 162 1/2 486

Ridge poles — 1 132 1/8 274 1/2

Brackets — 32 3/4 1 24

Common rafters — 178 18 1/4 4060 5/8

Hip rafters — 4 24 1 1/4 120

Jack rafters — 74 9 1/2 1 1/2 878 3/4

Beams to office and machinery — 6 20 3 3/8 400

D<sup>o</sup> to — D<sup>o</sup> — Upper Story — 4 20 3 3/8 266 2/3

Joists to — D<sup>o</sup> — D<sup>o</sup> — 28 30 1 1/4 1050

D<sup>o</sup> to kneading room & rear verandah 28 10 1 1/4 272 1/2

Brise-vent to front and rear

Verandah of machinery & office 4 10 2 80

Joists to — D<sup>o</sup> — 28 10 1 1/4 350

D<sup>o</sup> to verandah end rooms — 28 15 1 1/4 525

Brise-vent to — D<sup>o</sup> — 4 10 2 80

D<sup>o</sup> to upper story — 4 24 1 1/3 128

Rafters to — D<sup>o</sup> — 68 13 1 1/2 957 3/8

Total sqrs of Wood oiling two coats — 1500 8 3/4

# Particulars of Work

Measurement  
No. L B D Content Total

## Filling

|                                   |   |         |        |   |           |
|-----------------------------------|---|---------|--------|---|-----------|
| Ovens room                        | 1 | 119 1/2 | 29 1/2 | 2 | 7050 1/2  |
| Do                                | 1 | 29 1/2  | 29 1/2 | 2 | 2350 1/2  |
| Kneading room and rear verandah   | 2 | 16 1/2  | 9 1/2  | 2 | 613       |
| Machinery and Office              | 2 | 29 1/2  | 19 1/2 | 2 | 2301      |
| End room                          | 1 | 39 1/2  | 18 1/4 | 2 | 1487 1/4  |
| Do                                | 1 | 21 1/2  | 18 1/4 | 2 | 816 1/4   |
| Do                                | 1 | 16      | 18 1/4 | 2 | 608       |
| Do                                | 1 | 39 1/2  | 12 1/4 | 2 | 967 1/4   |
| Do                                | 1 | 39 1/2  | 25 1/4 | 2 | 1994 1/4  |
| Front and rear verandah of Office | 4 | 9 1/2   | 9 1/2  | 2 | 722       |
| Do Machinery                      | 4 | 10      | 14 1/2 | 2 | 1160      |
| Do Do End rooms                   | 4 | 51 1/2  | 9 1/2  | 2 | 3914      |
| End Verandah                      | 2 | 44 1/2  | 9 1/2  | 2 | 1691      |
| Total                             |   |         |        |   | 32156 1/2 |

## Deduction

|                                   |    |        |       |   |           |
|-----------------------------------|----|--------|-------|---|-----------|
| Grass walls between ovens         | 4  | 12 1/4 | 2     | 2 | 539       |
| Do under flue                     | 12 | 3 1/4  | 2     | 2 | 156       |
| Flue from ovens to Chimney        | 1  | 9 1/2  | 6     | 2 | 114       |
| Do from boilers to Do             | 1  | 9 1/2  | 4 1/2 | 2 | 85 1/2    |
| Side walls of Cistern             | 1  | 20 1/4 | 1 1/4 | 2 | 72 1/8    |
| Boilers                           | 1  | 24 1/2 | 10    | 2 | 490       |
| Total Deduction                   |    |        |       |   | 1457 1/8  |
| Total cft of filling in basements |    |        |       |   | 29698 3/8 |

# Particulars of Work

Measurement  
No. L B D Content Total

## Paving

|                                   |   |        |        |   |             |
|-----------------------------------|---|--------|--------|---|-------------|
| Ovens                             | 1 | 120    | 17 1/4 | 2 | 2130        |
| Do                                | 1 | 40     | 30     | 2 | 1200        |
| Office and Machinery              | 2 | 30     | 20     | 2 | 1200        |
| Kneading room and rear verandah   | 2 | 16 1/2 | 10     | 2 | 3240        |
| Do                                | 1 | 40     | 19 1/4 | 2 | 770         |
| End rooms                         | 1 | 22     | 19 1/4 | 2 | 423 1/2     |
| Do                                | 1 | 16     | 19 1/4 | 2 | 308         |
| Do                                | 1 | 40     | 12 1/4 | 2 | 510         |
| Do                                | 1 | 40     | 25 1/4 | 2 | 1030        |
| Front and rear verandah of Office | 4 | 10     | 10     | 2 | 400         |
| Do and Machinery                  | 4 | 10     | 15     | 2 | 600         |
| Do Do End rooms                   | 4 | 52     | 10     | 2 | 2080        |
| End                               | 2 | 44     | 10     | 2 | 880         |
| Total Paving                      |   |        |        |   | 13506 15/16 |

## Deduction

|                            |    |        |       |   |             |
|----------------------------|----|--------|-------|---|-------------|
| Grass walls under flue     | 12 | 3 1/4  | 2     | 2 | 78          |
| Flue from ovens to chimney | 1  | 10     | 6     | 2 | 60          |
| Do from boilers to Do      | 1  | 10     | 4 1/2 | 2 | 45          |
| Side wall of Cistern       | 1  | 21 1/4 | 1 1/4 | 2 | 26 9/16     |
| Boilers                    | 1  | 24 1/2 | 10    | 2 | 245         |
| Under kneading table       | 1  | 16     | 2.5   | 2 | 810         |
| Total Deduction            |    |        |       |   | 1264 9/16   |
| Total Sqrs of Paving       |    |        |       |   | 13506 15/16 |

# Particulars of Work

Measurement  
No. L B & Content Total

## Asphalting

Under kneading table 1 162 5 . 810  
Total sq. of Asphalting 810

No. of Wooden stair case with  
rails & Complete 2 2 2

No. of Attic Windows with  
frames & 24 3 . 1 1/2 24 24

## Painting

Doors painted and  
venetian with glazed

faulight (4x8) 24 4 1/2 . 2 1/2 2199 6

Do. Do. (4x7) 8 4 1/2 . 193 760 4/9

Windows venetian with

glazed faulight (4x4) 32 4 1/2 . 13 2113 9

Ventilating windows 24 3 1/2 . 4 1/2 358 3

Total sq. of Chocolate color paint 543 1 1/8

## Abstract of the foregoing Estimate

| Quantity | Description of Work                        | Rate    | Per | Amount | Total |
|----------|--------------------------------------------|---------|-----|--------|-------|
| 140 61   | bft. of concrete                           | 3 3 cts |     | 2856   |       |
| 23542    | Foundation stone in chunam                 |         |     |        |       |
|          | from stock on hand                         | 1 3 Ds  |     | 1839   |       |
| 9333     | Basement Ds                                | 1 3 Ds  |     | 729    |       |
| 23864    | Superstructure stone in chunam             | 3 . Ds  |     | 4475   |       |
| 13832    | Ds stock on hand                           | 1 6 Ds  |     | 1297   |       |
| 3012     | Brick in chunam                            | 2 9 Ds  |     | 518    |       |
| 736      | Arch work stone in chunam                  | 6 . Ds  |     | 276    |       |
| 3406     | Ds stock on hand                           | 2 6 Ds  |     | 532    |       |
| 1308     | Arch work brick in chunam                  | 4 . Ds  |     | 327    |       |
| 5654     | Brick in clay                              | 1 9 Ds  |     | 618    |       |
| 1819     | Arch work brick in clay                    | 3 9 Ds  |     | 341    |       |
| 428      | Pure brick in fire clay                    | 6 . Ds  |     | 161    |       |
| 617      | Arch work Ds                               | 9 6 Ds  |     | 366    |       |
| 52       | No. of Quoin stones for doors              | 15 . E  |     | 49     |       |
| 56       | Ds Ds 2 1/4 x 1 1/2 x 3/4                  | 12 . E  |     | 42     |       |
| 99       | Ds Ds for windows 2 1/8 x 1 1/2 x 3/4      | 15 . E  |     | 93     |       |
| 110      | Ds Ds 2 1/8 x 1 1/4                        | 12 . E  |     | 83     |       |
| 11       | Ds Stones for window sills 7 x 2 1/8 x 3/4 | 5 . E   |     | 55     |       |
| 24       | Ds Lintel stone over attic                 |         |     |        |       |
|          | windows 4 1/2 x 2 x 3/8                    | 1 . E   |     | 24     |       |
|          | carried over                               |         |     | 14681  |       |

| Quantity     | Description of Work                                                                                                             | Rate | Per Amount     | Total |
|--------------|---------------------------------------------------------------------------------------------------------------------------------|------|----------------|-------|
| Brought over |                                                                                                                                 |      |                | 14681 |
| 1740         | Rft. of cornice work                                                                                                            | 12   | Rft            | 1305  |
| 276          | Rft. of Stone slabs tread for steps                                                                                             | 4    | Rft            | 69    |
| 216          | Rft. of Ornamental parapets                                                                                                     | 1    | Rft            | 216   |
| 282.53       | Sqrs of Plastering with two coats                                                                                               | 2 8  | Sqrs           | 706   |
| 282.53       | White washing D <sup>o</sup>                                                                                                    | 3    |                | 53    |
| 1963         | Sqft. of Dressing                                                                                                               | 4    | Sqft           | 491   |
| 226.86       | Sqrs of Pointing                                                                                                                | 1 8  | Sqrs           | 340   |
| 2274         | Cft. of repairing and fixing woodwork                                                                                           | 3    | Cft            | 426   |
| 978          | N <sup>o</sup> of Nails 8" long                                                                                                 | 8    | N <sup>o</sup> | 41    |
| 115.80       | Sqrs of Roofing with $\frac{1}{2}$ new reapers<br>nails flat and pan tiles and<br>chunam borders 6 ft apart<br>and 9 in breadth | 15   | Sqrs           | 1737  |
| 135          | Rft. of Ridge ventilator                                                                                                        | 2    | Rft            | 270   |
| 2            | N <sup>o</sup> of Refixing the two end roofs                                                                                    | 135  | Each           | 270   |
| 14           | Trusses with iron work                                                                                                          |      |                | 8     |
|              | Complete                                                                                                                        | 40   | E              | 560   |
| 2            | Trusses to support hip<br>rafters - D <sup>o</sup>                                                                              | 30   | E              | 60    |
| 97.58        | Sqrs of Serracing with brick on<br>edge jelly 3" thick 3<br>Courses of flat tiles and 3<br>coats of plastering                  | 27 8 | Sqrs           | 2683  |
| Carried over |                                                                                                                                 |      |                | 23908 |

| Quantity     | Description of Work                                                                                         | Rate          | Per Amount     | Total |
|--------------|-------------------------------------------------------------------------------------------------------------|---------------|----------------|-------|
| Brought over |                                                                                                             |               |                | 23908 |
| 1274         | Sqrs of Semi terracing<br>with four courses<br>of flat tiles and 3<br>coats of chunam                       | 19            | D <sup>o</sup> | 242   |
| 16           | N <sup>o</sup> of columns $\frac{1}{2}$ feet dia<br>- meter and 10 feet high<br>with plastering<br>complete | 13 12         | E              | 220   |
| 646          | Rft. of Wrought iron spout<br>- 3 inner diameter<br>and $\frac{1}{16}$ thick                                | 12            | Rft            | 485   |
| 150.09       | Sqrs of Wood oiling two coats                                                                               | 2             | Sqrs           | 300   |
| 29.699       | Cft. of filling in basements                                                                                | $\frac{1}{2}$ | Cft            | 77    |
| 135.07       | Sqrs of relaying stone floor                                                                                | 7             | Sqrs           | 945   |
| 8.11         | Sqrs of Asphalting $\frac{3}{4}$ inch<br>thick                                                              | 9             | Sqrs           | 73    |
| 2            | N <sup>o</sup> of Wooden stair case<br>with rails &c<br>complete                                            | 20            | E              | 40    |
| 24           | N <sup>o</sup> of Ventilator lining<br>windows ( $3 \times 1\frac{1}{2}$ )                                  | 4             | E              | 96    |
| 54.32        | Sqrs of Painting with<br>two coats of chocolate<br>color paint                                              | 5             | Sqrs           | 272   |
| Carried over |                                                                                                             |               |                | 26658 |

| Quantity                      | Description of Work                                                 | Rate | Per | Amount | Total |
|-------------------------------|---------------------------------------------------------------------|------|-----|--------|-------|
|                               | Brought over                                                        |      |     | 26658  |       |
|                               | Sundries for fixing and repairing doors and windows and scaffolding |      |     | 2642   |       |
|                               | 4% at 10 Per cent                                                   |      |     |        |       |
|                               |                                                                     |      |     | 29300  |       |
|                               | Dismantling the lower story                                         |      |     | 3300   |       |
|                               | Total                                                               |      |     | 32600  |       |
|                               | Deduct value of surplus materials                                   |      |     |        |       |
| 6 <sup>3</sup> / <sub>4</sub> | Tons of Asphalt                                                     | 30   | ..  | 200    |       |
| 3000                          | bft of Teakwood                                                     | 2    | 12  | ..     | 8250  |
|                               |                                                                     |      |     | 8450   |       |
|                               | Total Rupees                                                        |      |     | 24150  |       |

Henry H. Stuart.  
Captain R.E.  
Executive Engineer  
Bangalore

Engg. Office  
Bangalore  
11<sup>th</sup> November 1872

27  
Specification to accompany  
Plan and Estimate for constructing  
Government Bakery at Bangalore.

Amount of Estimate Rupees 24,150—

Concrete

The lower steps of foundation to be built with concrete, the proportion of the Concrete will be as follows:— 4 Parahs of good gneiss broken into cubes of one to 2" free of quarry sweepings. 1 Parah of good unslaked lime. two parahs of ground bricks; the lime to be slaked while mixing the Concrete.

Foundation

The foundation to be laid with stone in chunam stones laid closely fitted with good bond and well flushed up with Chunam (3 parts of sand to two of fresh and well burnt lime) slaked on the work. Every sixth stone at least to be a through header.

Basement

The basement to be similarly laid

laid with outer joints scraped out and pointed. The top course of the basement to be of flat stones of as great a length as possible.

The Superstructure is to be of Superstructure hammer dressed stone in chunam laid in even courses not less than 9" deep, and level beds closely fitted with good bond every sixth stone at least to be a through header and well flushed up with chunam consisting of two parts of fresh and well burnt lime to three of sand, opening to be provided in the walls in the position shewn on the plan. Parapets and flue to be built with best bricks ( $9 \times 4\frac{1}{2} \times 2\frac{1}{2}$ ) in chunam (3 parts of sand to two of fresh and well burnt lime) slaked on the work. The bricks to be soaked in water before they are used and English bond to be observed throughout.

The arches to be neatly turned Arch work with

Cornice work

Dressing and pointing

Plastering Rooms

with well dressed stone in chunam. The joints all to radiate correctly according to the nature of the arch stones to be well dressed to the required shape and the key stone to be well driven home - joints not to exceed  $\frac{1}{4}$ " thick joints to be scraped out before plastered or pointed.

The description of the cornice should be of the pattern supplied by the Executive Engineer. Cornice bricks to have proper bearings as shewn in the plan and set with strong lime.

The arches to be well dressed and the joints scraped out and the beds pointed with strong lime - putting.

The joints to be scraped out and the walls plastered inside with two coats of chunam first coat to consist of one part of lime to  $1\frac{1}{2}$  of river sand well ground together and the second coat.

coat to be of 3 parts of lime to one of white  
sand well smoothed off.

The rooms to be whitewashed White washing  
inside with two coats of chunam to be  
approved of by the Executive Engineer.

The following proportion to be used  
in mixing the white wash.

For white washing 10 sq. ft.

Two Coats.

1. Parah of stone chunam

$7\frac{1}{2}$  Pounds of Gum

$\frac{3}{4}$  Measure of raw rice

Stone slabs for steps to be Steps

of the required dimensions according  
to the nature and size of the steps having  
the outer sides and edges dressed square  
and upper surface smoothly dressed.

The roof of the Centre Roof  
portion to be pent roof supported on  
trusses as shown in plan; each truss to  
bear

35  
bear on stone plates not less than  $(2 \times 2 \times \frac{1}{2})$   
The trusses to be 10 feet apart from  
centre to centre, the common and jack  
rafters to be  $1\frac{1}{2}$  feet apart and to be  
well secured with proper nails. The  
whole to be nailed with teak reapers  
 $(2\frac{1}{2} \times \frac{3}{4})$  and to be covered with flat and  
pan tiles with chunam borders.  
The gutter to be fixed with cement at the junction of  
the tiled roof with the 2 storied buildings arranged so as to have a  
fall from the centre of the roof to the various parts of the trusses.  
The various parts of the trusses  
to be fixed together to the joints by  
means of iron clamps  $(2 \times \frac{1}{4})$  bolts  
with screw heads and nuts, and chains to  
be sunk and screwed to the principal  
rafters to support purlins &c. A ridge  
ventilator to be provided as shown in  
the plan.  
The trusses over the End rooms will  
consist of eight Principals held together  
at the apex which are shod at their feet  
with stirrups and tied together by Iron  
tie rods

the rods sustained at the centre point of junction by a suspending rod held up at the apex of the principals. The principals are still further tied together at their ends with struts in the middle for prevention from deflexure. The rods are two inches diameter. Over the truss will come purlins (prevented gliding by iron cleats) which will support common rafters. rafters one course of flat and two courses of plain tiles with chunam borders.

The roof of the Office, Machinery and verandahs to be terraced with brick on edge 3" of jelly 3 courses of flat tiles and 3 coats of plastering well rubbed. Teak beams for the Office and Machinery to bear on stone plates not less than  $(2 \times 2 \times \frac{1}{2})$

The joists are to be laid  $1\frac{1}{2}$  feet apart from centre to centre.

The

637

The upper verandahs to be semi-terraced with four courses of flat tiles laid in strong chunam 3 coats of plaster with planed teak sleepers  $(2\frac{1}{2} \times \frac{3}{4})$  supported on rafters placed  $1\frac{1}{2}$  feet apart from centre to centre resting on brick pillars placed over the columns as shown in the plan.

Wooden flooring

The wooden floors of the Office and Machinery rooms of the Upper Story to be of teakwood planks 12" wide and 3" thick with screw nails  $\frac{1}{2}$ " and to be coated with two coats of wood oil.

Wrought iron Sponts

Wrought iron Sponts having 3" inner diameter and  $\frac{1}{16}$ " thick to be provided and fixed on the inner side of verandah walls  $\frac{1}{2}$ " and to be fastened to them by iron clamps at every five feet in the manner directed by the Executive

Engineers.

All the wood work of the Wood-  
roof to be properly scraped and cleaned, - oiling  
then coated with two coats of Wood oil.

The basement to be filled Flooring  
in with earth well watered and rammed  
till thoroughly consolidated, over this a  
flooring of stone slabs having a smooth  
surface not less than 4" thick with the  
edges dressed square to be laid in  
mortar joints scraped out and pointed  
with strong lime putty.

The floor under the kneading  
table to be laid with asphalt over a  
course of concrete mixed in proportion  
of 3 parts of stone jelly broken small  
4 parts of clean sharp gravel and  
one part of fresh ground stone lime to  
be laid down 6" thick well rammed and  
smoothed. This must be perfectly  
dry before the asphalt is laid over  
this, the

35  
the asphalt mixed in proportion 4 measures  
of asphalt to 3 of sand is to be laid in  
even joints  $\frac{3}{4}$  inch thick to be well  
rubbed and smoothed off with wooden  
foats wherever blisters appear, those  
places must be pricked and well smoothed  
with a hot iron and well rubbed.

Ventilators Ventilator swing windows  $3 \times 1\frac{1}{2}$   
frames  $4 \times 3$  and other fittings &c Complete  
to be provided and fixed in the position as  
shewn in the plan.

Painting The old paint on the present doors  
and windows to be properly scraped off  
and the doors washed with soap and  
water. The whole of the doors and windows  
to be coated with two coats of Carsons anti  
corrosive paint chocolate color.

Any such sundry repairs  
to the doors

to the doors and windows as are necessary  
to be executed.

Every thing necessary for the neat  
and workmanlike completion of the  
building to be provided whether parti-  
-cularly mentioned in the Estimate  
or not.

All materials and workman-  
ship employed to be of the best  
description and subject to the approval  
of Executive Engineer of Bangalore  
who shall have the entire power of  
ordering the removal of any work  
with which he is dissatisfied.

The whole of the work  
to be carried out as per plan and  
Estimate according to directions  
-sions mentioned thereon.

Any portion

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Any portion of the plan not  
understood can be referred to Executive  
Engineers and no excuses of the  
details not being clearly explained  
will be admitted hereafter.

Ext. Engg. Office  
Bangalore

11<sup>th</sup> November 1872

Henry W. B. B.  
Executive Engineer,  
Bangalore

J.

Thro: Secy to Govt:  
Mily & Dept:

Quartermaster General's Office  
Fort St George 11<sup>th</sup> January 1873  
No 31. 39

From  
Colonel H. O'Connell  
Offg. Quartermaster General  
To  
Colonel G. W. Walker Rb.  
Secretary to Government  
Public Works Department.

Sir,  
I have the honor to transmit  
with the approval of His Excellency  
the Commander in Chief, the accom-  
panying Plan and Estimate,  
the latter amounting to Rs. 24,150,  
for constructing a Government  
Bakery at Bangalore.

2. The Plan and  
Estimate in question are con-  
forwarded direct at the re-  
quest of the District Engineer  
Bangalore, to save time that  
the grant allotted to the work  
may not lapse.

I.

11-1-73  
Jag 5-1  
From the District Engineer  
Bangalore  
To the District Engineer  
5: Division  
Dated 12: Nov 1872  
Received 19: 65/73  
By Mr. M. A. S. S. S.  
Estimate of the  
probable cost of con-  
structing a Govern-  
ment Bakery  
at Bangalore  
amounting to Rs. 24,150  
30-11-73

I have the honor to be

Sir,

Your obedient Servant

J. T. Torrell Colonel

Offy. Dir. General

41

J. T.

May 19/53  
 To the Secy of the  
 War Department  
 No 38  
 No 1065

Military Department  
 Forwarded to the  
 Public Works Department

Will be sent  
 to the Secy of the  
 War Department  
 Jan 18/53

The Public Works Department  
 will be sent to the  
 Secy of the War Department  
 Jan 18/53

Submitted with  
 the approval of the  
 Public Works Department  
 No 38  
 No 1065  
 The Public Works Department  
 will be sent to the  
 Secy of the War Department  
 Jan 18/53

No 95  
 The estimate of Rs. 24,150 for  
 the construction of the Government Station  
 at Bangalore is sanctioned. It is  
 understood that the plan and estimate  
 have been approved by the subject  
 Engineer for buildings.  
 The work should be proceeded  
 with vigorously to ensure the completion  
 of the current year's work.

The Public Works Department  
 will be sent to the  
 Secy of the War Department  
 Jan 18/53  
 The Public Works Department  
 will be sent to the  
 Secy of the War Department  
 Jan 18/53

Govt. of {1873} Madras.

PUBLIC WORKS.

*To inspecting Cuzs for  
Buildings*

Dated

Recd.

Encl.

G. O., 11<sup>th</sup> Jan'y 1873, N95.

Nos. 183 & 184

Government Bakery  
at Bangalore.

Estimate of Rs.  
24,150 for the construction  
of the Government  
Bakery at Bangalore  
Sanctioned