

Public Works (1896) Department.

G.O., No. 2956 W

DATED 19th October 1896

sc
10426/96

[Despatch Abstract.]

Church at Begwada, Estimate of Rs. 14,000
for Constructing a — in the Kistna Dist.,
Sanctioned with remarks.
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T.C. 20/10
19/10

BUILDINGS AND ROADS.
CIVIL WORKS.

Government { 1896 } of Madras.
PUBLIC WORKS.

Recd.

Enclosures

Regd.

{ 1896.

Spare copies

G.O., No. 2956 W., 19th October 1896.

OCTOBER.

Church at Bezwada

Estimate of Rs. 14,000 for constructing a —, in the Kistna district, sanctioned with remarks.

GOVERNMENT OF MADRAS.

PUBLIC WORKS DEPARTMENT.

Buildings and Roads.
Civil Works.

READ—the following papers:—

From Major W. L. C. BADDELEY, R.E., Superintending Engineer, II Circle, to the Chief Engineer, Public Works Department, dated Bezwada, 15th May 1896, No. 414 K.N.

In reference to G.O., No. 2976 W., dated 20th November 1894, I have the honour to forward plans and estimates for a church at Bezwada to seat 100 persons.

2. The committee referred to in the Government order met in April 1895 and selected the site shown in the accompanying tracing, but I did not approve of it at the time and the plan shows that unless considerable expense (about Rs. 1,500) is incurred in removing the spoil bank, the building will be cramped; in short the site is distinctly a bad one.

3. A few days ago Mr. Atkinson, Mr. Keeling and myself again examined the various proposed sites, and a suitable one can be obtained on the right bank of the main canal near the Kistna Northern Division office. A regular site plan will be prepared and trial pits dug; but I do not think it advisable to delay sending on the plans and estimates, as the change of site will make no alteration in the amount of the estimate, and it is necessary to obtain early sanction to the estimates if the allotment for this year is to be utilized. None of the foundations will be put in until the new site has been approved by Government, and the Rev. J. Harrison will be asked to give his opinion regarding it. The committee has been slightly changed owing to the Kistna Northern division having been taken over from Captain Ellis, R.E., by Mr. Keeling.

From the Executive Engineer, Kistna Northern Division, to the Superintending Engineer, II Circle, dated 3rd July 1896, No. 199 S.E.

With reference to your letter No. 697 K.N., dated 13th June 1896, I have the honour to forward, herewith, a site plan showing the site proposed for the church building at Bezwada.

The building is shown with the orientation nearly true. There is no necessity to adhere rigidly to this, as a church is considered sufficiently oriented if within 30 degrees or even more. If this site is finally approved, several more trial pits will be dug before definitely fixing the exact position.

No. 892 K.N.

Forwarded to the Chief Engineer, Public Works Department, in continuation of No. 414 K.N., dated 15th May 1896. The Rev. J. Harrison has given his approval to the site now selected.

8th July 1896.

(Signed) C. A. SMITH,
for Suptg. Engineer, II Circle.

C. Nos. 4626 and 6191.

Note by the Chief Engineer, Public Works Department.

It seems doubtful whether the site between the main canal and the river is superior to that selected by the committee prescribed in G.O., No. 2976 W., dated 20th November 1894. It is near that of the old Eastern Division office, which cracked so badly that it was necessary to tie the walls together with iron rods, while the Executive Engineer's bungalow—which, if existing, would be still nearer to the proposed site for the church—had, owing to the inferiority of the soil, to be built on posts imbedded in the ground. Another objection to this site is that it is within some 70 feet of the river margin, any erosion of which would cause great anxiety in regard to the safety of the church. Before finally deciding on this site, it is thought important that these matters should be taken into consideration.

2. It is observed that no proposal is made to have the foundations of the tower any deeper than those of the rest of the building. It is, however, considered that they might, with advantage, be taken down two feet deeper. And if a tower be built it is important that, to guard against the consequences of unequal settlement, it should not be bonded with adjacent masonry.

3. As it has been decided that the Government grant shall not exceed Rs. 7,000, the tower, if constructed, will exist at the sacrifice of accommodation. The plan under consideration provides room for only 100 sittings, inclusive of the choir, though the number was originally fixed at two hundred. The Rev. J. Harrison might be consulted on this point. Should he consider provision for the larger number desirable, the tower must be sacrificed; and if the nave be lengthened, as shown in the tracing attached, the requisite accommodation will be provided.

4. The scantlings provided for the joists are weak. In the vestry and lamp room, where the span is eight feet, they are only $2\frac{1}{4} \times 4$ " against 3×5 " provided in the standard specification for joists spaced 1' 6" apart. In the south porch and tower, scantlings 3×4 " are provided as against $3 \times 5\frac{1}{2}$ " according to the standard specification.

5. There is no provision for the disposal of rain-water. Behind the battlements lead gutters will be necessary with down-take pipes at intervals, particularly for that portion of the building over the transept between the nave and choir, where the eaves will be at a lower level and a well will be formed. Leaden shoots, with or without down-take pipes, will be required for the terraced roofs.

6. Before the work is put in hand, the plans and estimates should be countersigned by the Venerable the Archdeacon, and approved in the Ecclesiastical Department.

7. The estimate is recommended for sanction, subject to reconsideration on the above points.

(Signed) D. McNEIL CAMPBELL, Col., R.E.,
5th October 1896. Chief Engineer.

ORDER—No. 2956 W., dated 19th October 1896.

The estimate, amounting to Rs. 14,000, for constructing a church at Bezwada, in the Kistna district, is sanctioned for execution in accordance with rule XXI, section IV of appendix K to volume I of the Public Works Code.

2. Attention is drawn to the Chief Engineer's note recorded above.

3. A sum of Rs. 4,000 has been provided for the work in the current year's budget against the Government grant of Rs. 7,000 promised in G.O., No. 2254 W., dated 7th September 1894. The Superintending Engineer will apply for the balance when necessary.

4. The sanction accorded in paragraph 1 has been registered as Provincial No. 89 W. of 1896-97, and classified as Civil Buildings—Original Works.

(True Extract.)

Under Secretary to Government.

To the Superintending Engineer, II Circle, with twenty-two enclosures.
 " Examiner, Public Works Accounts.
 " Ecclesiastical Department.

Exd. Shaik Karim.

Church at Berunda No. 2956 W. of 19th October 1896

PROCEEDINGS OF THE MADRAS GOVERNMENT.

Read the following

From the Supty Engr: II Circle, No. 414 K.N. of 15 May '96.
 do do do 892 K.N. of 8 July '96.
 Note by the Chief Engineer, P.W.D., of October 1896.

The estimate amounting to Rs 14,000 for constructing a church at Berunda in the Kistna District is sanctioned for execution in accordance with rule XXI, Section IV of Appendix K to Vol. I of the P.W. Code.

2. Attention is drawn to the Chief Engineer's note recorded above.

3. A sum of Rs 4000/- has been provided for the work in the current year's budget against the Government grant of Rs 7000 promised in Co. No. 2254 W dated 7th September 1894. The Superintending Engineer will apply for the balance when necessary.

G.C. Govt Rbf

4. The

4. The sanction accorded
in para 1 has been registered
as Provincial No 89 W of
1896-97 and classified
as Civil Buildings, original
works.

5/10/96

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5.10.96.

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23/11/96
The S. E. II circle with 22 inches.
" Exar. P. W. Accounts
" Ecclesiastical Dept.

3 Dec
Public Works Department
C.S. No 4626 & 6191.

Note by the Chief Engineer, P. W. D.:

It seems doubtful
whether the site between
the main Canal and the
River is superior to that
selected by the Committee
prescribed in Co. No.
2976 W dated 20th November,
1894. It is near that of
the old Eastern Division
office which used to be
so badly cracked, that
it was necessary to tie
the walls together with
iron rods, while the
Executive Engineer's
bungalow - which, if
existing, would be
still nearer to the
proposed site for the
Church - had, owing
to the inferiority of the
soil, to be built on
posts imbedded in the
ground. Another objection
to this site is that it is
within some 70 feet of the
River margin, any erosion
of which would cause
great anxiety in regard

the eaves will be at a lower level and a well will be formed. Leadern shoots - with or without down-take pipes - will be required for the terraced roofs.

6. Before the work is put in hand, the plans and estimates should be countersigned by the Venerable the Archdeacon, and approved in the Ecclesiastical Department.

7. The estimate is recommended for sanction subject to reconsideration on the above points.

5/10/96

ED

CHMS
5.10.96.

Public Works Department.

Current No. 4626 and 6191

Letters Nos. 414 KN. and 892 KN.

Dated 15 April '96 and 8 July '96

From the SE. A. Brice

Note of the Chief Engineer P.W.D.

It seems doubtful whether the site between the Main Canal and the River is superior to that selected by the Committee prescribed in S.O. 42 of 1876 dated 20th November 1894. It is noted that the old Eastern Division Office which used to be so badly cracked that it was necessary to tie the walls together with iron rods, while the Executive Engineer's bungalow - which, if existing would be still nearer to the proposed site for the Church - had, owing to the inferiority of the soil, to be built on posts imbedded in the ground. Another objection to this site is that it is within some 70 feet of the River margin, any erosion of which would cause great anxiety in regard to the safety of the Church. Before finally deciding on this site, it is thought important that these matters should be taken into consideration.

[P. W. 58
250-5-8-96.]

2. It is observed that

TECHNICAL NOTE.

Name of Work Constructing a Church at Begvada

Amount of Estimate, Rs. 14,000

PARTICULARS OF ESTIMATE.

Main Building	Rs. 12,050
Subsidiary Buildings	1,200
Furniture	540
Contingencies	210
Petty Supervision	
Land Compensation	

Total Rupees ... 14,000

PARTICULARS OF CONSTRUCTION.

Surface soil	Clayey loam	of
Sub-soil	- do. - do. -	64
Foundations	7 ft deep. The lower 3 ft of concrete mortar 6 ft wide. Upper 4 ft of random rubble in mortar in steps 1 ft deep from 1 to 2 ft broad. The whole resting on 1 ft of sand in the bottom of the foundation	63
Basement	2 ft high 1' 9" broad, of random rubble in mortar with dressed stone quoins	13
Walls	Random rubble in mortar with dressed stone quoins	75

0.2.5.426.

Plastering or Pointing Interior plastered with
2 coats and whitewashed. Outside
pointed with Surki mortar

Flooring Of Choir and Chancel of soap
stone on 6" concrete. Of Vestry
and Lamp Room Bezzada stone on 6"
concrete.

Roofing Nave, Choir, and Chancel Mangalore
tiles with 1/2" cedar plankings below
Vestry Lamp Room and Tower. Tinned.

Doors and Windows Doors panelled
Windows. Stone mullions, and stone
bracery in the arched portion. Iron sashbars

Roof timbers Godaveri Teak

Scantlings See Remarks

Rates Fair

The plinth area of the main building is
2527 square feet, and the cost per square
foot will be Rs. 5. 1. 0.

The plans and estimates have been countersigned
by the Ven. The Archdeacon
and not approved in the Ecclesiastical
Dept.

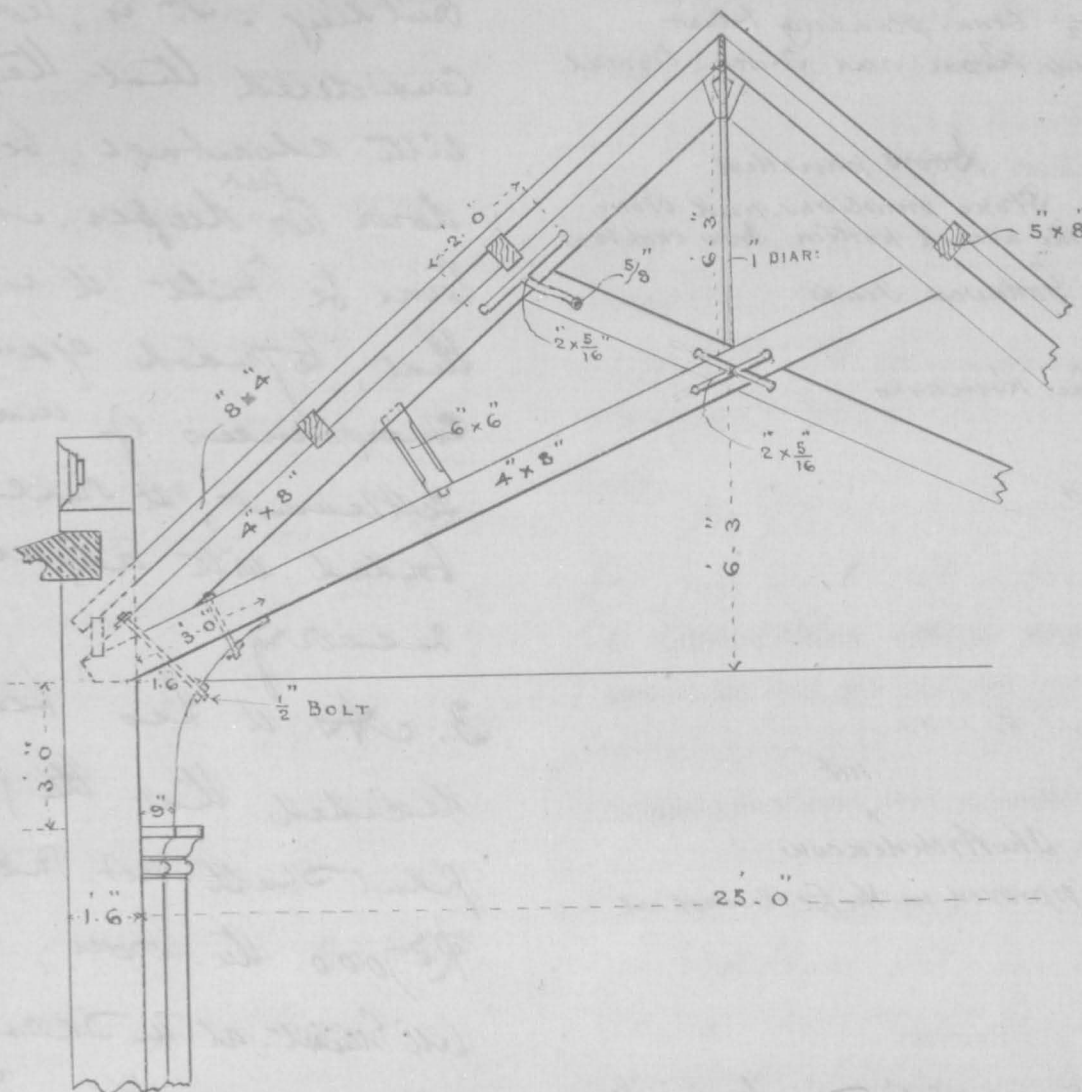
REMARKS.

A Sum of Rs 7000 having been
guaranteed by the Rev. J. Harrison
C.M.S. Bezzada towards the cost
of erecting a church at that
Station. The Gov^t was addressed
on 2nd May 1893 thro' the Collector
of the District, to contribute a
grant of Rs 7000 towards the
Construction of the Building and
G.O. No. 2690 W. of 24. 10. '93 ordered
that the Gov^t of India should be
addressed.

The Gov^t of India in its No
43 A/C.M. dated 9/2/94 having
stated that a grant was admissible
under rule XI. (a) Sect. IV Appendix
M. P.W.D. Code 6th Edn. p. 1184 the
preparation of Plans and Estimate.

No proposal is made
to have the foundations
of the tower any deeper than
those of the rest of the
building. It is, however,
considered that they might
with advantage, be taken
down ^{feet} two deeper. And if a
tower be built it is important
that, to guard against the
consequences of unequal
settlement, it should not be
joined with adjacent
masonry.

3. As it has been
decided that the Government
must not exceed
Rs 7000 the tower, if constructed
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accommodation. The plan
under consideration provides
room for only 100 sittings,
exclusive of the choir, though
the number was originally fixed
at two hundred. The Reverend
J. Harrison might be
consulted on this point. Should
be consider provision for the
larger number desirable,
the tower must be
~~eliminated~~ sacrificed; and
if the nave be lengthened,
as shown in the tracing
attached, the requisite



29564
Jal
22/9/96.

accommodation will be provided

4. The scantlings provided for the joists are weak. In the Vestry and Lamp Room, where the span is 8 ft., they ~~are~~ are only $2\frac{1}{4} \times 4$ against 3×5 provided in the Standard Specification for joists spaced 1' 6" apart. In the South Porch and Tower, scantlings 3×4 are provided as against $3 \times 5\frac{3}{4}$ according to the Standard Specification.

5. There is no provision for the disposal of rain-water. Behind the battlements lead gutters will be necessary with down-take pipes at intervals, particularly for that portion of the building over the transept between the nave and choir, where the eaves will be at a lower level and a well will be formed. Leaden shoots, with or without down-take pipes - will be required for the terrace roofs.

6. Before the work is put in hand, the plans and Estimates should be completed.

Signed

was ordered in G.O. 2254 W. of 7. 9. 94

In accordance with this G.O. the S.E. & Bridge Submits under his No. 414 K.N. of 15 Apr. 1896 Plans, including Site plan, and Estimate amounting to Rs. 14,000

The original site, which was selected by a Committee ordered under G.O. 2976 W. of 20. 11. 94 was on a spoil bank in the fork between the Ellore and Sivas Banals, and in preparing the Estimate the foundations were designed with reference to this site.

In forwarding the Estimate for approval the S.E. states that he "considers this site a distinctly bad one", and subsequently a fresh site was selected near the Krishna Northern Dn. Office, and a new site plan forwarded under S.E.'s No. 892 K.N. of 8 July 1896

A trial pit on the new site is reported to show clayey loam to a depth of 12 ft. and the foundations provided for the original site will not be excessive for the site now selected.

The provision made in the Est. for 1 foot of sand at the bottom of the foundation trenches is probably insufficient and it would be better to deepen the trenches 1 foot, and allow 2 feet depth of sand. This would cost about Rs 75 extra

Cost of 1 ft of Sand as per Est.	63
" " 3100 cu yds of Earthwork.	13
& Sufficient, I think.	Total.
	75

Scantlings The scantlings provided for the Joists are rather weak. In the Vestry and Lamp Room for Joists 8 ft span, spaced 1' 6" apart $2\frac{1}{4} \times 4$ is provided

The Scantling allowed being 3"x5" as per Standard Specifications. In the S. Porch and Tower for 9ft clear span 3"x4" is provided in Estimate, as against 3"x5" Standard Specifications.

Guttering No provision is made in the Estimate for disposal of storm water from the roof dead flashing. in the form of a continuous lead gutter will be required behind the battlements with downtake pipes at intervals. This will be particularly necessary for the portion of the roof over the transept between the nave and choir, where the eaves will be at a lower level and a deep well will be formed behind the battlements. Lead down shoots, with or without downtakes will also be required for the terraced roofs.

Accommodation S.E. II Biele in his No 278 K.S. of 14 May 1896 embodied in G.O. 2254 W. of 7 Sept 1894 proposed a Church of 200 sittings, it being considered that that accommodation was necessary with reference to the present Christian population of Bejrada, and its prospective rapid increase, owing to the rising importance of the Town.

A ground plan for a Church containing 200 sittings was submitted under S.E. 5 1108 K.S. of 11 Aug. 1894 and on this a grant of Rs 7000

by the Venerable Mr
Archdeacon, and
approved in the
Ecclesiastical Department.

Consd
1.10.96.

The Estimate may be
recommended for
sanction subject to re-
consideration in the
above points.

Consd
1.10.96.

was provided in G.O. 2254 W. of 7 Sept 94.

It is not stated what became of this plan, but it was probably abandoned on account of cost, its total area being nearly double that of the Plan now submitted viz. 4400 sq ft.

The present Plan purports to provide 100 sittings only, but in the Scale provided in Rule IX (a) Appendix K. P.W.D. Code p. 486. viz. 6 superficial feet for each sitting the actual accommodation provided is only 90 sittings, each bench seating $\frac{10 \times 3}{6} = 5$ persons and 18 benches 90 persons. If however the sitting accommodation for the choir be taken into consideration there will be 100 sittings.

A lump sum of Rs 1,200 is included in the Estimate for furniture. Apparently it was not necessary to provide this sum in the Estimate for construction, as Rule XXIV (1) Appendix K. page 493 distinctly lays down that such furniture will be supplied by the Public Works Dept. and the cost allowed in addition to the grant for the Building. and this amount might have been utilized in lengthening the nave of the Church by inserting another bay. This would increase the accommodation 50 %.

The accommodation would still fall short of 200 sittings, and if as would appear from the correspondence embodied in G.O. 2254 such provision is absolutely necessary it becomes apparent that the Church

has been designed on too expensive a style for the funds available, and the entire revision of the Plan becomes essential.

By sacrificing the Tower and lengthening the nave by 2 bays as shown in tracing attached, the required accommodation could be provided very nearly within the limits of the funds available, and a further economy could be effected by substituting plain braced trusses as per sketch attached, ^{Plg to do that} instead for the handsome hammer beam trusses provided in the Estimate, the simple truss could be made at a cost of Rs 1000 as against Rs 325 the cost of the hammer beam truss.

The grant is sanctioned under Rule IV, and if the question of accommodation be waived and the Plan approved the ~~gr~~ accommodation is sufficient to admit the grant of Rs 7000.

The internal area = 1918 Sq. ft.
the rate admissible Rs 4.60 per Sq. ft. which amounts to Rs 8391

For

22/9/96

For

The S. of S. has given permission to calculate the Govt. grant under Rule IV Sec IV Appendix K. Vol II, (b) under condition of the i.e. in accordance with grants for military churches. If the present estimate be accepted, the proposed grant of Rs 7000 will still be within the limit -

The work must be carried out in accordance with the rules in para

XXI. There is a budget grant of Rs 4000 for the work -

24.9.96.

Letter from the Executive Engineer, District Northern Division, to the Superintending Engineer, 2nd Circle, No 199 L.R. dated 3rd July 1896.

With reference to your letter No 697 K.R. dated 13th June, 1896, I have the honour to forward herewith a site plan showing the site proposed for the Church building at Bexavada.

The building is shown with the orientation nearly true. There is no necessity to adhere rigidly to this, as a church is considered sufficiently oriented if within 30° even more. If this site is finally approved, several more trial pits will be dug before definitely fixing the exact position.

892

Enclosure: No 881 K.R.

C. P. S. S.

Site plan

1.26
1.27
5.99

P.W.D.
1,000-1-10

Forwarded to the Chief Engineer, P.W.D. Department in continuation of No 414 K.R. of 15th May 1896. The Rev. J. Harrison has given his approval to the site now selected.

Amith
for Superintending Engineer

Mr. Keeling and myself again examined the various proposed sites, and a suitable one can be obtained on the right bank of the Main Canal near the Krishna Northern S.E. Office. A regular site plan will be prepared and trial pits dug; but I do not think it advisable to delay sending on the plans and estimates as the change of site will make no alteration in the amount of the estimate, and it is necessary to obtain early sanction to the estimates if the allotment for this year is to be utilized. One of the foundations will be put in until the new site has been approved by Government; and the Rev. J. Harrison will be asked to give his opinion regarding it. The Committee has been slightly changed owing to the Krishna Northern S.E. having been taken over from Captain Ellis R.E. by Mr. Keeling.

I have the honour to be,
 Sir,
 Yours most respectfully,
 W. B. Baddley Major R.E.
 Superintendent II Civil.

in accordance with
 there is a budget grant of Rs 4000/-
 24.9.96.

[Faint, mostly illegible handwriting on the reverse side of the page, appearing to be a continuation of the notes or a separate set of notes.]

2770 W. 20-11-94
2554 W. 7-9-94
2690 W. 24-10-93

NO. 4626

From

The Supg Engineer

Second Circle

To The Chief Engineer
P. W. Department

Dated 15 April 1896

Enclos. 15

No 414 R.M.

Church at Bezvada

— Forwards for sanction
plans & estimates for
constructing a—

1. L.S. 436.

in accordance with
XXI. There is a budget grant of Rs. 4000 for

Ce 24.9.96.

Encls 21 (8 plans)
Ores: 19.5.96