TENDER DOCUMENT

TENDER No: PAT/CON/720/01 DATED 17/02/2016

FOR

Tender For “Construction Of 5.00 Llpd Dairy Plant at Dehri-On-Sone, Bihar, From Grid Y11 To Y19 etc complete.”

VOLUME - II

Additional Conditions of Contract

Technical Specifications

Drawings
ADDITIONAL CONDITIONS OF CONTRACT (ACC)

The following Additional Conditions of Contract shall be read in conjunction with General Conditions of Contract. If there are any provisions in these Additional Conditions of Contract, which are at variance with the provisions of General Conditions of Contract, the provisions in these Additional Conditions of Contract shall take precedence.

1.0 INTRODUCTION

Bihar State Milk Co-Operative Federation Limited, Patna, BIHAR has decided to construct 5.00 LLPD Dairy Plant at Dehri-On-Sone, Bihar.

2.0 Description of the Project and scope of work:

· The project site is located at Dehri-On-Sone, Bihar

Scope of Work:

The brief particulars of scope of work in the tender shall include (but not limited to) civil construction of 5.00 LLPD Main Dairy Block from grid Y11 to Y19 at Dehri-On-Sone, Bihar.

Apart from above, any other services not covered above but required as per direction of EPI are deemed to be included in the scope of work.

The work is to be carried out on item rate basis as per bill of quantities and tender conditions for CIVIL Work of Dairy Plant

The scope of service includes construction of the above as well as all infrastructural facilities like water supply, sanitary & plumbing, electrical.

ORDER OF PRECEDENCE OF DOCUMENTS

i. Particular specification and special condition and clients GCC & SCC
ii. Drawings
iii. Indian standard specifications of BIS codes
iv. EPI's ACC.
v. EPI's GCC
This supersedes the EPI's GCC Clause No.42.1 only.

3.0 SET OF TENDER: Clause no.6.0 of EPI's GCC shall be modified as under:

The set of tender documents shall contain one set of hard copy of tender drawings. The original hard copy of tender drawings shall be returned along with the tender documents duly signed and stamped by the tenderer and shall form part of agreement.
4.0 Prior approval shall be obtained from the ENGINEER-IN-CHARGE for all drawings & designs, specifications, finishes and all materials to be used for the works. All materials to be used for this work shall conform to relevant IS code or CPWD Specifications applicable in the contract. All brought out material shall be of BIS approved manufacturer. ENGINEER-IN-CHARGE shall be entitled to get any material, procured for the works, tested in any laboratory other than site testing laboratory and the cost for such testing including the cost of delivery of the material to the laboratory are to be borne by the Tenderer.

5.0 **RETENTION MONEY** - Clause no. 10.0 of GCC shall be modified as under:-

The retention money shall be deducted from each running bill of the Contractor at 8% (eight percent only) of the gross value of the Running Account. The Earnest Money Deposited by the tenderer in the form of Demand Draft will be treated as part of the Retention Money. The Retention Money shall be refunded to the Contactor after expiry of defects liability period or on payment of the amount of the final bill whichever is later. If the amount of Retention Money deduction in cash is more than Rs.1.00 (Rupees One Crore only), the excess amount can be refunded to Contractor against submission of Bank Guarantee of equivalent amount from a Nationalized Bank/ Scheduled Bank in the prescribed Proforma of Performance Guarantee of EPI.

6.0 **SECURITY DEPOSIT CUM PERFORMANCE GUARANTEE:**

2.0% (Two Percent only) of contract value to be submitted by contractor within 10 days from the date of issue of telegram/letter/telex/Fax of intent of acceptance of tender. The performance BG is kept as 2% instead of 5% up to defect liability period. All other conditions shall be same given in EPI's GCC Clause no.9.0.

7.0 **TAXES AND DUTIES** – Sub-clause no. 13.1 of Clause 13.0 of GCC shall be modified as under. Sub-clauses no. 13.2, 13.3, 13.4 & 13.5 of clause no.13.0 stand good.

“The contractor shall be responsible for the payment, wherever payable, at his own cost of all taxes such as excise duty, custom duty, sales tax, including the purchase tax, consignment tax, work contract tax, service tax, VAT or any other similar tax in the state concerned, turnover tax, toll tax, octroi charges, royalty, cess, labour cess, professional taxes, levy and other tax (es) or duty (ies) which may be specified by Local / State / Central Government from time to time on all materials, articles which may be used for this work. The rates quoted by him in the Tender in Bill of Quantities shall be inclusive of all such taxes, duties, etc. The imposition of any new and / or increase in the aforesaid taxes, duties, levies (including fresh imposition of work contract tax, turnover tax, sales tax on work contract, VAT or any other similar tax) etc. during the currency of the contract shall be borne by contractor and shall not be paid or reimbursed to the contractor by EPI. In the event of non-payment / default in payment of any octroi, royalty, cess, labour cess, professional taxes, turnover tax, sales tax, including the purchase tax, consignment tax, work contract tax, VAT, service tax or any other similar tax in the state concerned, customs, excise or any other levy / tax including labour dues etc. by contractor, EPI reserves the right to with-hold the dues / payments of contractor and make payment to Local / State / Central Government authorities or to laborers as may be applicable. The
contractor should submit along with the Tender Registration Certificates with Sales Tax on works contract authority etc. otherwise appropriate recovery shall be made from his bills.

Client’s GCC Clause no.34b shall also be applicable.

8.0 EXTRA OR DEVIATION ITEMS
To be derived from PWD (BIHAR) current schedule of rates or DSR or MES or item rate analysis. If not possible to be derived as per market analysis. After the rates approved by client, 90% of the approved rate shall be paid and balance 10% shall be deducted by EPI towards its Over Head & Profit.

9.0 COMPLETION AND TAKING OVER
As soon as the project is finally completed, the Contractor shall inform EPI and EPI shall in turn inform to COMFED. COMFED shall nominate a Board of Officers for checking/verification of completed work as per the scope of work for final taking over the project.

10.0 A final certificate of rectification of all defects pointed out by the handing over taking over board detailed by COMFED /EPI and/or during defect liability period shall be obtained from the nominated officer of COMFED /EPI prior to releasing of the Security deposit by EPI.

11.0 Clause No. 72.4.1 of GCC stands modified as under:
Within 10 (Ten) days of date of Letter of Intent, the contractor shall submit a Time and Progress Chart (CPM/PERT/Quantified Bar Chart) and get it approved by the Engineer-in-Charge. The Chart shall be prepared in direct relation to the time stated in the contract documents for completion of items / scope of the works. It shall indicate the forecast (milestones) of the dates of commencement and completion of various items trades, sections of the work and may be amended as necessary by agreement between the Engineer-in-Charge and the Contractor within the limitations of time imposed in the contract documents, to ensure good progress during the execution of the work. The physical report including photographs shall be submitted by the contractor on the prescribed format & the intervals (not later than a month) as decided by the Engineer-in-Charge. The compensation for delay as per clause 72.1 (revised as per ACC) shall be leviable at intermediate stages also, in case the required progress is not achieved to meet the time deadlines of the completion period and/or milestones of time and progress chart provided always that the total amount of compensation for delay to be paid under this condition shall not exceed 10% of the tendered value of work.

In case entire work is completed within the total time period of completion or extended period of completion allowed, the compensation for delay due to not achieving progress at intermediates stage, if any, shall be refunded without any interest charges.
12.0 COMPLETION SCHEDULE

For 5.00 LLPD Dairy Plant At Dehri-On-Sone ,Bihar.

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Period from the date of Start</th>
<th>Cumulative value as a percentage of total value of work to be completed.</th>
<th>Description of work to be completed during the period specified under column no. 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>From the date of start up to the end of 1&lt;sup&gt;st&lt;/sup&gt; month</td>
<td>25%</td>
<td>Completion of foundation upto plinth level.</td>
</tr>
<tr>
<td>2</td>
<td>From the start of 2&lt;sup&gt;nd&lt;/sup&gt; month up to the end of 3&lt;sup&gt;rd&lt;/sup&gt; month</td>
<td>65%</td>
<td>Completion of Structure of all buildings, Drainage etc</td>
</tr>
<tr>
<td>3</td>
<td>From the start of 4&lt;sup&gt;th&lt;/sup&gt; month to end of 5&lt;sup&gt;th&lt;/sup&gt; month</td>
<td>100%</td>
<td>Completion of 70% flooring, plastering, internal services of electrical, plumbing including fittings and fixtures, testing and handing over of buildings &amp; external</td>
</tr>
</tbody>
</table>

Note: In case of mismatch in financial and physical progress as at col. No. 3 & 4, above at any milestone stage, the financial progress shall be considered for levy of compensation of delay, if any. All infrastructural development works shall be completed within the stipulated time frame.

13.0 PLANT & MACHINERY

All plant & machinery required for execution of work shall have to be arranged by the contractor at his own cost. However, the Contractor has to deploy following minimum plant & machinery at site immediately after award of work:

<table>
<thead>
<tr>
<th>S. No.</th>
<th>Description</th>
<th>Minimum numbers required</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Batching Plant of 15cum capacity for concreting</td>
<td>One</td>
</tr>
<tr>
<td>2.</td>
<td>Digital theodolite &amp; auto level</td>
<td>One</td>
</tr>
<tr>
<td>4.</td>
<td>Vibrators (Petrol / Electrical)</td>
<td>Two</td>
</tr>
<tr>
<td>5.</td>
<td>Needles of Vibrator</td>
<td>Six</td>
</tr>
<tr>
<td>6.</td>
<td>Weigh Batch Concrete Mixers</td>
<td>One</td>
</tr>
<tr>
<td></td>
<td>Description</td>
<td>Unit</td>
</tr>
<tr>
<td>---</td>
<td>-----------------------------------------------------------------------------</td>
<td>------</td>
</tr>
<tr>
<td>7</td>
<td>DG Set (62.5 KVA)</td>
<td>One</td>
</tr>
<tr>
<td>8</td>
<td>Loader cum excavator</td>
<td>One</td>
</tr>
<tr>
<td>9</td>
<td>Tripper/Dumper</td>
<td>Two</td>
</tr>
<tr>
<td>10</td>
<td>Welding machine with cables</td>
<td>One</td>
</tr>
<tr>
<td>11</td>
<td>Gas cutting set</td>
<td>Two</td>
</tr>
<tr>
<td>12</td>
<td>Diesel Vibro/ Road Roller (8-12 tonne Capacity)</td>
<td>One</td>
</tr>
<tr>
<td>13</td>
<td>Transit mixer</td>
<td>One</td>
</tr>
</tbody>
</table>

a) Any other equipment for site test as outlined in CPWD/ BIS specification and as directed by the Engineer-in-Charge.

b) The quantities of equipments indicated are tentative and can be increased as per the requirement of work OR as per the direction of Engineer-in-Charge. The above equipment list is indicative and not complete. The contractor has to deploy all the required equipment to complete all the works within stipulated specifications & time period as per contract documents.

c) The contractor will not be allowed to take out equipments from the site without the written permission of Engineer-in-Charge.

14.0 The final bill will be submitted by the contractor within 90 days from the date of acceptance of completion of work accompanied by the following documents:

a) Completion certificate issued by the Engineer-in-Charge specifying the handing over of the work including list of inventories (fittings & fixtures).

b) Computerized stage wise payment schedule.

c) No claim certificate by the contactor.

d) No claim certificate from the sub-agencies / venders engaged by the contractor.

e) ‘As built’ drawings.

f) Periodical services and measurement books.

g) Drawings for layout of underground cables and details showing location of sluice valves, electric cable joints etc.

h) All operation and maintenance manuals.

i) All statutory approvals from various state / central govt. local bodies, if required for completion & handing over of the work as included in scope of Contractor.

j) Manufacture’s guarantee of various machines / equipments installed as part of works.

15.0 FACILITIES:

The sub-clause 28.3 of the clause no. 28 of General Conditions of Contract (GCC) for Furnished Office Accommodation & Mobility and Communication to be Provided by Contractor to EPI shall be replaced and read as under:-

The contractor shall make his rates in Bill of Quantities sufficiently comprehensive to cover the cost of the facilities as per details shown below and the contractor shall not be entitled for any extra payment for the same for Dehri-On-Sone.
I. OFFICE WITH FACILITIES – The contractor is to provide office at the Location Dehri-On-Sone with following facilities till defect liability period.

<table>
<thead>
<tr>
<th>A) OFFICE / LABORATORY</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Furnished Office/ Office cum Residential accommodation with furniture as per direction of EPI with basic amenities like toilets, drinking water arrangement, lights, fans etc. for exclusive use of EPI’s Engineers &amp; Staff. Maintenance of the same till Defect Liability Period shall be borne by the contractor. The Specifications and Design of accommodation shall be as approved by EPI.</td>
<td>Sq. ft. 500</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>B) OFFICE EQUIPMENT</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>a) Computer (Pentium-IV, i7, i5 Core2 Duo, window 8) with minimum 250GB HDD along with UPS &amp; Operator (In case computer operator is not provided by the contractor, recovery of Rs. 8000/- per month shall be made from the Contractor’s bill in this regard) and latest Version of Software’s like MS Project, Windows, MS Office, Autocad etc.</td>
<td>Nos. 1</td>
</tr>
<tr>
<td>b) Laser Printer or any other Printer of equivalent amount. All-in-one printer (Fax, Print, Scan, Copy)</td>
<td>Nos. 1</td>
</tr>
<tr>
<td>c) Refrigerator (165 Ltrs) or any other gadget of equivalent cost as decided by EPI.</td>
<td>Nos. 1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>B). CONVEYANCE AND OTHER FACILITIES</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Vehicle (Brand New) Four wheel drive Scorpio DX vehicle or equivalent with Driver and accessories valuing Rs. 30,000/- each vehicle. Monthly running shall be restricted to 3000 Kms each.</td>
<td>Nos. 1</td>
</tr>
</tbody>
</table>

The vehicle shall be brand new and shall be provided with driver on full time basis. Consumables like diesel/petrol/oil lubricants and spare parts etc. shall be provided by the Tenderer at their cost. The vehicles shall be maintained in good working condition. In case of breakdown, replacement of vehicle shall be provided by Tenderer. Registration, transportation etc. shall be borne by the Tenderer. In case a vehicle is not required by EPI, a recovery of Rs. 40,000/- (Rupees Forty thousand Only) per month per vehicle shall be made from the Tenderer for this purpose till the end of defect liability period.

In case Driver, POL, maintenance of any vehicle is not required by EPI, a recovery of Rs. 20,000.00 per month per vehicle shall be made from the Tenderer for this purpose till the end of defect liability period.

The above gadgets facilities should be brand new and of reputed make and all facilities shall be provided and maintained properly (including payment of water & electricity bills etc. for office accommodation only) by the Tenderer at Project site or at any other office related with execution of this project till completion of wok, handing over, defect liability period in all respect at his own cost. The Tenderer shall also make stand-by arrangement for water & electricity to ensure uninterrupted supply.
The equipment/items shall be the property of Tenderer at the end of contract. The Tenderer shall be responsible for watch and ward of site office and other facilities etc. In case of theft/damage of any equipment/items, the Tenderer shall immediately replace the same within a maximum period of two days.

The Tenderer shall provide ‘Sign Board(s)’ as per design approved by EPI and/or Client.

In case the above facilities are not provided by the Tenderer within 10 (ten) days of award of work or replacement is not provided within the specified period, EPI shall arrange the same at the risk and cost of the PARTY and make the recoveries from the bills of the Tenderer for the same. The decision of EPI shall be final and binding on the Tenderer in this regard.

16.0 SITE LABORATORY & OFFICE FOR EMPLOYER (COMFED)

1. A waterproof and air-conditioned, lockable, office-accommodation for EMPLOYER (COMFED) consisting of two (2) rooms each of approx. 15 sq. meters shall be constructed by the successful bidder. These offices shall be provided with all sanitary, water supply and electrical services and shall be kept in clean and tidy conditions. Necessary display boards, office furniture, Almira’s and telephone facilities will be provided therein, all at bidder’s cost till defect liability period.

2. The Display Boards for the Project shall be supplied and erected as per given sizes, specifications and descriptions and at specified locations, as approved by EMPLOYER/EPI.

3. A field Laboratory will be established in a room of suitable size equipped with the minimum following items/equipment, with adequate labour and materials required for carrying out tests therein:

   (i) Set of standard sieves for testing grading of sand and a 75 micron sieve for testing silt content.
   (ii) Sieves with openings respectively of 5mm, 10mm, and 20mm for testing grading of aggregates.
   (iii) Balance of capacity 10 Kg reading to 5 gm, with weights.
   (iv) Primus stove and pans for drying of sand and aggregates.
   (v) Glass measuring flasks of 1/2 and 1 litre capacity
   (vi) Flask for determining moisture content of sand.
   (vii) Slump cone for slump test.
   (viii) Minimum 24 steel moulds for 150 x 150 mm test cubes. It may be necessary to provide more steel cube moulds depending upon concreting programmed.
   (ix) Work benches, shelves, desks, sinks and any other furniture and lighting as required by the ENGINEER-IN-CHARGE.
   (x) Cube testing machine.
   (xi) Any other equipment not specifically mentioned above which can reasonably be held necessary for the completion of the contract works to the satisfaction of the ENGINEER-IN-CHARGE. NOTE: The requisite tests shall be conducted in field Laboratory as per P.W.D. Specifications and other related I.S. Codes. All such tests shall be conducted in presence of the ENGINEER-IN-CHARGE and the proper Test Records shall be
maintained by CONTRACTOR with the attestations by the ENGINEER-IN-CHARGE. The CONTRACTOR shall bear all expenses for installing, running and maintenance of this Field Laboratory.

17.0 The Tenderers must understand that the items marked in schedule of work are actual items to be executed. Alteration, omission, deduction or addition from / to these items is at the discretion of the employer without effecting the terms of the contract. The rates have to be quoted on the basis of item rate on the estimated value of the work.

18.0 ENVIRONMENTAL CONSIDERATIONS:

The Contractor shall be concerned with the impact of his work upon the Environment. This applies to the effect upon the residential community, adjacent industrial facilities and upon the area outside the site boundary. Areas of concern will include but are not limited to:

a) Use of clean fuels to minimize air polluting emissions.
b) Control of other air pollutants.
c) Recovery and recycling of usable materials.
d) Control of vehicle noise
e) Control of noise from power facilities.
f) Limitation of vibrations.
g) Preservation of natural land to the extent possible.
h) Preservation of archaeological features.

19.0 Custody of Drawings:

All the approved Drawings shall remain in the sole custody of the Engineer-in-Charge but two copies thereof shall be furnished to the Contractor free of charge. The Contractor shall provide and make at his own expenses any further copies required by him. At the completion of Contract the Contractor shall return to the Engineer-in-Charge all drawings provided under the Contract.

One copy of the Drawings, furnished to the Contractor as aforesaid, shall be kept by him on the site and the same shall at all reasonable times be available for inspection and use by the Engineer-in-Charge and his Representatives and by any other person authorised by the Engineer-in-Charge.

20.0 Disruption of Progress:

The Contractor shall give written notice to the Engineer-in-Charge on progress of the works likely to be delayed or disrupted unless any further approval of drawing or order, including a direction, instruction or approval is issued by the Engineer-in-Charge within a reasonable time. The notice shall include details of the drawing or order required and of why and by whom it is required and of any delay or disruption likely to be suffered if it is late.

21.0 Delays and Cost of Delay for Drawings:

If, by reason of any failure or inability of the Engineer-in-Charge to issue within a time reasonable in all the circumstances any approval of drawing or order requested by the
Contractor in accordance with clause (6) of this section, the work remains suspended or delayed then the Contractor shall be granted necessary extension of time only. But he shall have no claim to extra payment or compensation whatsoever on the grounds of above delay.

22.0 Delay in Getting Site of Work:

If at any time after the issue of work order, the work, and/or any part thereof cannot be started or shall remain suspended due to public opposition, non-availability of site, delay in shifting public utilities or for any other reason whatsoever within the period of completion of work, the Contractor shall be granted necessary extension of time. But he shall have no claim to extra payment or compensation whatsoever on the grounds of above delay.

If, however, the above hindrances are not removed within the schedule time and the Contractor is not agreeable to execute further works in the extended time, the Contract may be terminated and the Contractor shall have no claim to any payment on account of idle labour, establishment etc. or compensation whatsoever on account of any profit or advantage which he might have derived from the execution of the aforesaid work in full or in part.

23.0 Arrangement of Land:

If on account of restriction of space within the project site, the Contractor experiences difficulties (on installation of plant and machinery and also) in stacking construction materials within the project site, he may have to arrange for lands(Road side flank, private land etc.) adjacent to the project site on his own and at his cost. The Contractor will not be entitled to any payment or any other incidental charges caused due to such arrangement.

24.0 Fire Fighting Arrangement:

The Contractor shall provide at his own cost suitable arrangement for fire fighting. For this purpose he shall provide requisite number of Fire Extinguishers and adequate number of buckets, some of which are to be always filled with sand and some with water. These equipments shall be provided at suitable prominent and easily accessible places and shall be properly maintained.

25.0 Reduced Rates and Part Rates:

25.1 Reduced rates as decided by the EPI shall be allowed for the works, which in the opinion of the EPI are not done in strict conformity with specification and schedule of works but are acceptable. The relevant item rates in such cases shall be reduced and approved by the Tender Accepting Authority, on the basis of analysis, which shall be binding to the contractor.

Works which are not in conformity with the specification and not acceptable in the opinion of E.I.C. will not be paid for and the cost of rectification or dismantling of such unacceptable work will have to be fully and solely borne by the Contractor.
25.2 Part payments for items, which are not fully complete as per specification of the contract, may be made by EPI/COMFED in cases when it is ensured that the items can be completed as per specification, in following days, by the contractor, when so allowed by the E-I-C. Application of this provision shall be very restricted and can only be exercised under specific case wise approval of the E-I-C strictly.

26.0 Supplementary and Substituted works:

(a) COMFED/EPI may require the contractor to do some additional work, newly or in substitution of items in the schedule of work, in the interest of the work under the contract. In such cases ‘Supplementary’ and / or ‘Substituted’ items may result. The specification and other details shall be governed and directed by the Tender Accepting Authority. The rate of such items shall be finalized and approved by competent authority of COMFED/EPI. The claim sheets, serially in triplicate, shall have to be furnished by the contractor, duly checked and forwarded, with item wise comments of approval by EPI. The claim sheet forms a part of the original contract and shall have all the relevant bearings of the contract. The limitations of such claims shall be governed by prevailing financial powers and provisions of COMFED.

These claims are usually termed as ‘extra claims’ and relates to extra works. Thus, no such extra works can be taken up by the contractor until their written appeal is allowed by the Tender Accepting Authority.

Notwithstanding to what has been stated elsewhere, any item of work which can be legitimately considered as not stipulated in the ‘Scope of work’ of the contract, but becomes necessary as a reasonably contingent during actual execution of the work, it will have to be done by the contractor as and when directed by the EPI.

The admissibility of any claim of supplementary / substituted item or the acceptance thereof including award of item wise rates and all other related matters will rest with the tender / quotation accepting authority and shall be binding to all concerned.

(b) Rates for Supplementary and Substituted item of works: The schedule of rates shall mean the schedule of rates PWD, Bihar, DSR, MES or any references made in similar other authorities, as been settled by COMFED/EPI, applicable during the tenure of this contract. Rates for any other item (or part thereof), which are not covered in the said schedule of rates, will be analyzed from various other references and market rates, in which usual profit and overhead (as per state PWD schedule) will be included.

27.0 Time of Completion

The entire work as per offer shall be completed within 5 (Five) months from the date of issue of work order/LOI. The time of completion is firm and final and supersedes any other time mentioned elsewhere in any clause(s) of tender document.

The period of completion given includes the time required for mobilization and testing as well, rectifications, if any, re-testing and completion in all respects to the entire satisfaction of the Engineer-in-Charge including the monsoon season.
The Contractor shall scrupulously adhere to the targets/program as envisaged in his micro-plan of work program by deploying adequate personnel and construction tools and tackles and he shall also supply all materials of his scope of supply in time to achieve the targets set out.

The Contractor shall give every day a report on category-wise labour and equipment deployed along with the progress of work done on previous day. The progress of work shall be proportionate to completion time.

Time is the essence of this contract and the allotted work must be completed within the specified time. Extension of time may be granted in very exceptional circumstances if the work gets delayed due to the reasons beyond the control of the successful bidder. This clause of extension of time will have precedence over any other similar clauses if they are at variance with this clause. There will be penalty for non-completion of the work in time as indicated elsewhere.

28.0 A standard benchmark with reference to which the whole work is to be carried out shall be constructed by the CONTRACTOR. The level shown on the outline drawings are with reference to standard benchmark. The CONTRACTOR shall establish reference benchmark at suitable spots. The construction and maintenance of the bench marks shall be the responsibility of the CONTRACTOR. No payments shall be made for this work.

29.0 INFORMATION TO BE SUPPLIED BY THE CONTRACTOR DURING THE CONSTRUCTION PERIOD.

A senior representative of the CONTRACTOR shall attend weekly meetings at the site and in addition, meetings as arranged by the EMPLOYER to discuss the progress of work and sort out problems if any and ensure that the work is completed in the stipulated time. The CONTRACTOR shall submit to the Engineer-in-Charge, every fortnightly:

a. Detailed industrial statistics regarding the labour employed by him daily.
b. A fortnightly progress report along with requisite photographs.
c. Special incident at site.
d. Whether the work is progressing according to schedule, or not. If not, what are the problems and the remedial measures to be taken to regain schedule.
e. Record of the approvals by EMPLOYER
f. Record of the discussions by EMPLOYER
g. Fortnightly Construction Schedule
h. Monthly Construction Schedule
i. Detailed Schedule indicating when the REPRESENTATIVE’S presence is required at site.
j.

30.0 The Contractor shall comply with all the provisions of the following statutory acts or any modifications thereto and the rules made there under from time to time.
Additional Conditions of Contract
Engineering Projects (India) Limited

1. Additional Conditions of Contract

- Indian Factories Act 1948
- Payment of Wages Act 1936
- Minimum Wages Act 1948
- Employers Liability Act 1938
- Apprentices Act 1961
- Workmen’s Compensation Act 1923
- Industrial Disputes Act 1947
- The Maternity Benefits Act 1961
- Contract Labour (Regulation and Abolition) Act 1970
- Employment of Children Act 1933
- Provident Funds and Miscellaneous Provisions Act 1952
- The Employee’s Pension Scheme 1995

31.0 Should a report be made by an Inspecting Officer, as defined in the Contract Labour (Regulation and Abolition) Act 1970, the Developer shall have the right to deduct from any money due to the Contractor any sum required, or estimated to be required, for making good the loss(es) suffered by a worker or workers by the reason of non-fulfillment of the Conditions of the Contract relating to the benefits of workers, non-payment of wages or of deduction made from their wages which are not justified by the terms of the Contract or non-observance.

32.0 The Contractor shall indemnify the employer against any payments to be made as hereunder and for the observance of the provisions of the aforesaid Acts.

33.0 In the event of the Contractor committing a default or breach of any of the provisions of the aforementioned Acts, as amended from time to time, of furnishing any information or submitting or filling in any Form/Register/Slip under the provision of these Acts which is materially incorrect, then on the report of the Inspecting officers, the Contractor shall, without prejudice to any other liability, pay to the employer a sum not exceeding Rs. 1000.00 as Liquidated Damages. This shall be applied to each incident for every default, breach or furnishing of, submitting, making and/or filling-in materially incorrect statements, the exact amount shall be fixed by the Engg. in Charge.

34.0 In the event of the Contractor’s default continuing in this respect, the Liquidated Damages may be increased to Rs 100.00 per day for each day that default occurs up to a maximum of one percent (1%) of the Contract Amount.

35.0 The E I C shall deduct such amounts from the interim application for Payment or the Security Deposit of the Contractor and credit the same to the Welfare Fund constituted under these Acts. The decision of the Employer in this respect shall be final and binding.

36.0 REQUIREMENT OF TECHNICAL STAFF FOR THE WORK:
### Additional Conditions of Contract

**Engineering Projects (India) Limited**

#### Requirement of Technical Staff

<table>
<thead>
<tr>
<th>Qualification</th>
<th>Number</th>
<th>Minimum Experience (Years)</th>
<th>Rate of Recovery</th>
</tr>
</thead>
<tbody>
<tr>
<td>Project manager with Degree</td>
<td>1</td>
<td>15</td>
<td>Rs 80,000 PM</td>
</tr>
<tr>
<td>Site Engineer with Degree</td>
<td>1</td>
<td>10</td>
<td>Rs 60,000 PM</td>
</tr>
<tr>
<td>Quality Control Engineer</td>
<td>1</td>
<td>10</td>
<td>Rs 50,000 PM</td>
</tr>
<tr>
<td>Site Supervisor</td>
<td>3</td>
<td>5</td>
<td>Rs 30,000 PM</td>
</tr>
</tbody>
</table>

Note: The above supersede EPI's GCC Clause No. 27.3. Other supportive staff shall also be adequately deployed by the Contractor as per the requirement of work OR as directed by the Engineer in Charge. Rate of recovery in case of non-compliance of above will be stipulated as above.

#### ALTERATION IN SPECIFICATION, DESIGN & DRAWING:

The Engineer-In-Charge shall have power to make any alterations in, omissions from, additions to or substitutions for, the original Specifications, Drawings, Designs Quantity and Instructions that may appear to him to be necessary during the progress of the work, and the Contractor shall carry out the work in accordance with any instructions which may be given to him in writing signed by the Engineer-In-Charge and such alterations,
omissions, additions, or substitutions shall not invalidate the contract and any altered, additional or substituted work which the Contractor may be directed to do in the manner above specified as part of the work shall be carried out by the Contractor on the same conditions in all respects including Rate on which he agreed to do the main work.

The time for the completion of the work shall not be extended in the proportion that the altered, additional or substituted work price bears to the original contract work price, and the certificate of the Engineer-In-Charge shall be conclusive as to such proportion. Over and above this, a further period to the extent of 25 percent of such extension shall be allowed to the Contractor.

38.0 The Conditions as laid hereunder to be strictly complied during construction and operation phase regarding environmental clearance as per provisions of Environmental Impact Assessment Notification, 1994 with subsequent amendments.

39.0 COMPENSATION FOR DELAY AND REMEDIES:

If the Contractor fails to maintain the required progress in terms of clause 72.4 or relevant clause of Additional Conditions of Contract, to complete the work and clear the Site on or before the completion date or extended date of completion, he shall, without prejudice to any other right or remedy available under the law to EPI on account of such breach, pay as agreed compensation the amount calculated at the rates stipulated below or such smaller amount as the Engineer in charge (whose decision in writing shall be final and binding) may decide on the amount of tendered value of the work for every completed day / week (as applicable) that the progress remains below that specified in Clause 72.4.1 or the relevant clause in Additional Conditions of Contract or that the work remains incomplete. This will also apply to items or group of items for which a separate period of completion has been specified.

i) For works with completion period exceeding 3 month (as originally stipulated) @ 1.5% per month of delay to for delay of work be computed on per day basis.

Provided always that the total amount of compensation for delay to be paid under this Condition shall not exceed 10% of the Tendered Value of work or of the Tendered Value of the item or group of items of work for which a separate period of completion is originally given. The amount of compensation may be adjusted or set-off against any sum payable to the Contractor under this or any other contract with EPI even after completion of the work.

40. SPECIFIC CONDITIONS:

A. Construction Phase

All required sanitary and hygienic measures should be in place before starting construction activities and to be maintained throughout the construction phase.
1) During the construction phase average water requirement of about 185 cubic meters per day would be met from tankers. Water usage during construction should be optimized to avoid any wastage.

2) The Workers employed during the construction phase will have to be provided adequate drinking water and sanitary facilities. The safe disposal of wastewater and solid wastes generated during the construction phase should be ensured.

3) All the topsoil excavated during construction activities should be stored for use in horticulture/ Landscape development within the project site.

4) Disposal of muck including excavated material during construction phase should not create any adverse effects on the neighboring communities and should be disposed off by taking necessary precautions for general safety and health aspects.

5) Use of diesel generator sets during construction phase should be of enclosed type and should conform to E (P) A Rules prescribed for air and noise emission standards.

6) Vehicles to be hired for bringing construction material at site should be in good condition and should conform to applicable air and noise emission standards and should be operated only during non peaking hours.

7) Ambient noise levels should conform to residential standards both during day and night. Incremental pollution loads on the ambient atmosphere and noise quality should be closely monitored during construction phase.

8) Construction spoils including bituminous material and other hazardous materials must not be allowed to contaminate watercourses and the dump sites for such material must be secured so that they should not leach into the ground water.

9) Regular supervision of the above and other measures should be in place although the construction phases so as to avoid disturbance to the surroundings.

10) Use of energy efficient construction materials to achieve the desired thermal comfort should be incorporated.

11) No idle charges or compensation shall be paid for idling of the Contractor’s labour, staff or Plant & Machinery etc. on any ground or due to any reason whatsoever. EPI will not entertain any claim in this respect.

B. Operation phase:

1) The project proponent shall obtain necessary permissions from COMFED before drawing the water from the sources for the purpose of the proposed construction activity.

2) Noise barriers will be provided at appropriate locations so as to ensure that the noise levels do not exceed the prescribed standards.
3) The solid waste generated should be properly collected, segregated before disposal to the City municipal facility.

4) Any hazardous waste including biomedical waste from the site should be disposed of as per applicable Rules & norms with necessary approvals of the Bihar Pollution Control Committee.

5) Incremental pollution loads on the ambient air quality, noise and water quality should be periodically monitored after commissioning of the project.

PART – B GENERAL CONDITIONS

1) Provision should be made for the supply of kerosene or cooking gas / pressure cooker to the laborers during construction phase.

2) All the laborers to be engaged for construction works should be screened for health and adequately treated before the issue of work permits.

3) Financial provision should be made by the project proponent in the total budget of the project for implementation of the suggested safeguard measures.

4) COMFED/EPI reserves the right to add additional safeguard measures subsequently, if found necessary and to take action including revoking of the environment clearance under the provisions of the environmental (Protection) Act, 1986, to ensure effective implementation of the suggested safeguard measures in a time-bound and satisfactory manner.

41.0 PRICE ESCALATION:
No Escalation shall be allowed in any case. The EPI’s GCC Clause no. 16.0 shall be unchanged.

42.0 MOBILIZATION ADVANCE:
No mobilization advance shall be paid.

43.0 SECURED ADVANCE ON NON-PERISHABLE MATERIALS:
During the progress of the execution of the work up to 75% of the assessed value of any materials which are in the opinion of the Engineer in-charge of EPI/Client nonperishable, Non fragile and non combustible are in accordance with the contract and which have been brought on the site in connections there with and are adequately stored and/or protected against damage by weather or their causes but which have not at the time of advance been incorporated in the work. When materials on account of which advance has been made under this sub-clause are incorporated in the work, the amount of such advance shall be recovered/ deducted from the next payment made under any or the clause/clauses of this contract.

44.0 INTEREST RATE ON MOBILIZATION ADVANCE:
SBI PLR + 2% per annum, if applicable

45.0 SPECIFICATION OF WORKS:
The work shall be done as per details specification of work and as per RCD/BCD/PHD/Electrical Department, Government of Bihar along with the structural design/Drawing duly vetted by NIT/IIT and approved by COMFED/EPI.

46.0 The contractor shall make arrangement for Project Sign Board as per the Format attached in annexure-1.
GENERAL TECHNICAL SPECIFICATION

FOR

CONSTRUCTION OF 5.0 LLPD DAIRY AT DEHRI ON SONE BIHAR

Note: These specifications shall be read in conjunction with Bihar PWD Specifications 2014 and other relevant specifications described in these specifications.

1. The work in general shall be carried out as per Bihar PWD specifications, 2014 (updated with correction slips issued up to last date of submission of tender) and Text of revised PWD Specifications for Cement Mortar, Cement Concrete and RCC Works unless otherwise specified in the nomenclature of the individual item or in the particular specifications for civil works and BBCD specification, 1994 for Electrical.

2. In the absence of any definite provisions or any particular issue in the aforesaid specification, reference may be made to CPWD specifications, the latest BIS codes and specifications of IRC, BS, ASTM, AASHTO, MORTH and CAN/CAS in that order. Where even these are silent, the construction and completion of works shall conform to sound engineering practice as approved by the Engineer-in-Charge. In case of any disputes arises out of the interpretation of the above, the decision of the Engineer-in-Charge shall be final and binding on the Contractor.

Wherever reference is made in the contract to specific standard codes to be met by the materials, plant and other supplies to be furnished, and work performed or tested, the provisions of the latest edition or revision of the relevant standards and codes in effect shall apply, unless otherwise explicitly stated in the contract. Where such standards and codes are national or related to a particular country of region, other internationally recognized standards which ensure a substantially equal or higher performance than the standards and codes specified will be accepted subject to the Engineer-in-Charge prior review and written approval. Difference between the standards must be fully described in writing by the contractor and submitted to the Engineer-in-Charge at least 15 days prior to the date when the contractor desires the Engineer-in-Charge's approval. If the Engineer-in-Charge determines that such proposed deviations do not ensure substantially equal performance, the contractor shall comply with the standards specified in the documents.

3. Absence of terms such as providing, supplying, laying, installing, fixing etc. in the description does not even remotely suggest that the Contractor is absolved of such providing, supplying etc. unless an explicit stipulation is made in this contract. The owner shall bear no costs of materials, equipments, duties, taxes, royalties etc.

4. The classification of various items of work for purpose of measurements and payments shall be as per bills of quantities (BOQ). Except where distinguished by the BOQ, the rates apply to all heights, depths, sizes, shapes and locations. They also cater for all cuts and wastes.

5. The specifications may have been divided in different sections/sub-head for convenience only. They do not restrict any cross-reference. The Contractor shall take in to account inter-relations between various parts of works/trades. No claim shall be entertained on basis of compartmental
interpretations.

6. Any builder's work required as part of electrical and other installation shall be executed by the Contractor as directed under this contract.

7. The Contractor shall be required to submit and take approval from the Engineer of shop drawings of the items of work specified in the specifications or as directed from time to time. No extra payment shall be made for the same. Shop drawings shall be in metric units and shall be prepared in a format approved by the engineer.

8. The Contractor shall prepare and submit as-built drawings by way of making modifications/changes carried out with respect to the construction drawings issued prior to the construction of respective elements. These will be then incorporated by the respective Consultant/agency in to their drawings for maintaining necessary records for the owner.

9. No walls, terraces shall be cut for making any opening after waterproofing has been done without approval of the Engineer. Cutting of waterproofing when authorized by the Engineer in writing shall be done very carefully so that no other portion of the waterproofing is damaged. On completion of the work at such places, the waterproofing membrane shall be made good and ensured that the opening/cutting is made fully waterproof as per specifications and details of waterproofing approved by the Engineer at no extra cost. No structural member shall be cut or chased without the written permission of the Engineer.

10. All materials intended to be used at site shall be tested prior to its use in an approved manner. The frequency of tests of construction materials shall be as per the CPWD Specifications or as specifically mentioned in the Technical specifications or in special conditions of contract. Cost of all such tests and any other tests felt necessary by the Engineer shall be deemed to be included in the price of respective materials quoted by the Contractor. Any defective material brought to site shall be returned without any extra cost for the same.

11. Performance tests shall be carried out as the discretion of the Engineer on all/any items, of work as directed by the Engineer. Should any item shall fail to pass the tests, the Contractor shall be given opportunity to take corrective measures and have the same re-tested to the satisfaction of the Engineer, he may at his sole discretion order dismantling of the whole or part of the works done and order the Contractor to reconstruct the same. The cost of all these operations and materials shall be borne by the Contractor without any extra claim.

12. The Contractor may make a special note of the strictness of the concrete mix to be adopted in items of maximum water-cement ratio, minimum slump, control of total chloride and sulphate contents, use of admixtures etc.

13. Minimum cement contents are given purely from durability point of view. Larger contents shall have to be provided if demanded by mix design.

14. Provision of cement slurry to create bond between plain/reinforced concrete surface and subsequent applied finishes (floor, plaster, dado, skirting etc.) shall not be paid extra.

15. Provision of grooves in plaster, drip course etc. if directed at junctions of
16. Mix design using smaller aggregates of 10 mm down shall also be done in advance for the use in junction having congested reinforcement.

17. A full fledged laboratory shall be established at site to start of construction and shall also stock all relevant codes as per the requirements of the special specifications.

18. Procedure of mixing the admixtures shall be strictly as per manufacturer’s recommendations if not otherwise directed by the Engineer.

19. The batching plant for all concrete shall be used. Alternatively, use of ready mix concrete from an approved source shall be permitted. Concrete shall be transported using concrete pumps of adequate capacity including necessary stand by.

20. All water tanks and other liquid retaining concrete structures shall undergo hydro testing as per special specifications.

21. Special benches shall be provided at site for stacking reinforcement bars of different sizes as per the specifications.

22. Formwork for beams of RCC areas shall be designed in such a way that the form work of the adjacent slabs can be removed without disturbing the props/supports of the beams.

23. In the mobilization period, the Contractor shall carry out expeditiously and without delaying the following works:
   a) Material testing and mix design of concrete as contemplated in the specifications.
   b) Setting up of full fledged site laboratory as per the requirement of these specifications.
   c) Any other pre-requisite items required for final execution.

24. If the same item appears in different heads / subheads of the BOQ, the Contractor shall quote a unique rate for the item otherwise the lowest rate quoted for the item in different heads/ subheads will be considered for payment.

25. All installation shall comply with the requirements of Indian Electricity Rules, 1956 and Indian Electricity Act – 1910 as amended up-to date, and by laws of authority of State Government of any other Department.

26. All Mechanical works related to Public Health Engineering will conform to the requirements of manual of Water Supply by the Ministry of Urban Development and various Indian Standards as listed there-in.

27. All Electrical work will conform to various Indian Codes as listed to Technical Specifications.
# LIST OF RECOMMENDED MAKES / MANUFACTURERS

<table>
<thead>
<tr>
<th>S.No.</th>
<th>Description of item</th>
<th>Recommended make / Manufacturers</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>CIVIL WORKS</td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>Cement &amp; cement putty</td>
<td></td>
</tr>
<tr>
<td>1.1</td>
<td>Grey cement</td>
<td>LA FARGE, BIRLA, ACC</td>
</tr>
<tr>
<td>1.2</td>
<td>White cement</td>
<td>Birla white, JK Cement</td>
</tr>
<tr>
<td>1.3</td>
<td>Cement Putty</td>
<td>Birla white, JK</td>
</tr>
<tr>
<td>2</td>
<td>HYSD bars / structural steel work</td>
<td>Tisco, Sail, Vizag</td>
</tr>
<tr>
<td>3</td>
<td>High Tensile bolts</td>
<td>Hilti, Fischer, Bosch</td>
</tr>
<tr>
<td>4</td>
<td>Neoprene Elastomeric Bearing</td>
<td>Killick Nixon Ltd, Steel Auto Industries, Metco</td>
</tr>
<tr>
<td>5</td>
<td>PTFE sliding bearing</td>
<td>Rollon Bearings Pvt. Ltd., Steel Auto Industries</td>
</tr>
<tr>
<td>6</td>
<td>Autoclaved Aerated Concrete Light</td>
<td>Sand plast India Ltd., The Indian Merchants</td>
</tr>
<tr>
<td>7.1</td>
<td>Water proofing compound For mixing</td>
<td>Fire stone, Pidilite, MYK Schomburg, STP EPDM</td>
</tr>
<tr>
<td>7.2</td>
<td>Plasticisers, Non Shrink grout.</td>
<td>Bal indura, Krishna Conchem, Fairmate, STP</td>
</tr>
<tr>
<td>7.3</td>
<td>For terrace slab</td>
<td>Fosroc, Pidilite, Hydrogrout and hydro cem from</td>
</tr>
<tr>
<td>7.4</td>
<td>Chemical / Mechanical Anchor Fastners</td>
<td>Hilti, Fischer, MKT (Germany)</td>
</tr>
<tr>
<td>8</td>
<td>Expansion joint</td>
<td></td>
</tr>
<tr>
<td>8.1</td>
<td>Name of manufacturers</td>
<td>Bizar, Herculis, Tristar, STP, Faremate</td>
</tr>
<tr>
<td>9</td>
<td>Flush doors and ply</td>
<td></td>
</tr>
<tr>
<td>9.1</td>
<td>Flush door shutters</td>
<td>Austin, Century, Green, Donear</td>
</tr>
<tr>
<td>9.2</td>
<td>Plywood (BWP Marine Grade)</td>
<td>Austin, Century, Greenply etc.</td>
</tr>
<tr>
<td>9.3</td>
<td>Marine grade Block Board</td>
<td>Austin, Century, Greenply etc.</td>
</tr>
<tr>
<td>9.4</td>
<td>Laminates</td>
<td>New Mica, Optus, Sunmica, Greenlam, Century,</td>
</tr>
</tbody>
</table>
## 10 Glass and other items

| 10.1 | Glass (relevant code BS 952) | Saint Gobain  
| | Heat Strengthened Glass | Ashai  
| | Toughened Glass | Pilkington  
| | Laminated Glass |  
| | Safety Glass |  
| | Annealed Glass |  |

| 10.2 | Silicon Sealants | GE Silicone / Dow Corning / GE  |

| 10.3 | Structural Sealant | Dow Corning GE  |

| 10.4 | Weather Sealant | Dow Corning / GE  |

| 10.5 | Double sided tape | Norton, 3M  |

## 11 HARDWARE FITTINGS

| 11.1 | Aluminium Extrusions | Hindalco / Indal / Jindal  |

| 11.2 | Aluminium hardware fittings | Godrej, Dorset,Ozone,Kitch,EBCO  |

| 11.3 | Door / Window fitting / hardwares | Neki / Kich ,Hefle , dorma  |

| 11.4 | Stainless Steel hardware fittings | Ozone,Dorma ,Dline,kitch, Hefle  |

| 11.5 | Stainless Steel Railings | D line ,Dorma, Kich,Ozone  |

| 11.6 | Stainless Steel | Salem Steel / Indalco / Jindal  |

| 11.7 | Bolts, Screws (SS-316) | Hilti / Fisher  |

| 12 | Glass sheet / float glass ( for glazed portions of normal wooden doors /windows ) | Saint Gobain , Modi , Ashai Float glass India Ltd  |

## 13 Flooring

| 13.1 | Chequered Tiles ,Paver Blocks | Ultra Tiles,Nitco , Unitiles , /Pavit  |

| 13.2 | Floor Hardener Floor hardeners- (Dry shake / Liquid nonmetallic) | Liqui Hard of W.R.Meadows , MYK Schomburg,Fosroc,Fairmate  |

| 13.3 | Vitrified Tiles | Kajaria,Somani,Johnson  |

| 13.4 | Ceramic Glazed tiles | Kajaria,Somani,Johnson  |

<p>| 13.5 | Glass Mosaic Tiles | Bissaza India Ltd , Palladio, Italia, Pixel Mosaic India  |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>13.6 Mirror</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Modi Glass, Ashai, Atul</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>13.7 Tile Adhesive</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Ferrous, Bal adhesive, Laticrete, Pidilite</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>14 U PVC Pipes &amp; Accessories</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Finolex, Prince, Supreme</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15 PAINTS</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.1 Oil bound washable distemper, plastic emulsion paint &amp; Enamel paints</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>ICI, Berger, Spectrum Paints, Asian Paints</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.2 Water proof cement paint</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Super snowcem, Asian Paints, Spectrum Paints</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.3 Epoxy Paint</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Asian Paints, Pidilite, ICI</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.4 Nitro Cellulose paint (Duco Paint)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>I.C.I., MRF</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.5 Weather shield paint</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>ICI, Asian, Berger, paints</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15.6 Red Oxide Primer</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Berger, Asian Paints, Garware Paints</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>16 Adhesive for tiles /glass Mosaic tiles</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Pidilite, Bal Adhesive, Saint-Gobain</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>17 Poly sulphide sealants</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Fosroc, Roffe, Mc Bauchemei</td>
<td></td>
</tr>
</tbody>
</table>