Agenda Notes

FC NO. 20

2013: 1st Meeting *of the* Finance Committee

Venue of the Meeting

Conference Hall, The Imperial, New Delhi

Date and Time of the Meeting

March 01, 2013 at 10.30 HRS

PDPM
Indian Institute of Information Technology, Design and Manufacturing Jabalpur

PANDIT DWARKA PRASAD MISHRA
INDIAN INSTITUTE OF INFORMTION TECHNOLOGY,
DESIGN AND MANUFACTRING JABALPUR (M.P.)

FC/2013/1ST MEETING OF THE FINANCE COMMITTEE
TO BE HELD ON MARCH 01, 2013 AT 10.30 A.M.
VENUE : Conference Hall, The Imperial, New Delhi

AGENDA

Agenda Item No.	Item	Page
FC/2013:01:01	Opening Remarks by the Chairman	1
FC/2013:01:02	Overview Report by the Director	2
FC/2013:01:03	Confirmation of Minutes of FC/2012/2nd Meeting held on July 05, 2012	3-6
FC/2013:01:04	To consider recommendations of Building and Works Committee held on February 02, 2013	7-123
FC/2013:01:05	To consider the proposal for Revised Detailed Project Report of the Institute to be submitted to MHRD, GOI	124-139
FC/2013:01:06	To consider the proposal for Revised Budget Estimates (Plan) for the F.Y. 2012-13 and Budget Estimates (Plan) for the F.Y. 2013-14	140-161
FC/2013:01:07	Any Other Item with the permission of the Chair	162

FC/2013:01:01	**Opening Remarks by the Chairman** Will be presented in the meeting itself.

FC/2013:01:02	**Overview Report by the Director** Will be presented by the Director in the Meeting itself.

FC/2013:01:03	**Confirmation of Minutes of the Meeting FC/2012/2nd held on July 05, 2012** The Minutes of Meeting were circulated to all the members and no comments have been received. The Committee is requested to confirm the Minutes. Recommendations are placed from **Page No. 4 to 6.**

PANDIT DWARKA PRASAD MISHRA
INDIAN INSTITUTE OF INFORMATION TECHNOLOGY,
DESIGN & MANUFACTURING JABALPUR

Minutes of FC/2012/2nd Meeting of the Finance Committee held on July 05, 2012 from 11:00 A.M. in the Conference Hall, Shastri Bhawan, MHRD, New Delhi.

Members Present:

1.	Prof. S. V. Raghavan Scientific Secretary to PSA, Govt. of India(GOI)	Chairman
2.	Prof. U. B. Desai Director, IIT Hyderabad	Member
3.	Prof. Ashok Jhunjhunwala IIT Madras	Member
4.	Prof. Aparajita Ojha, Director, PDPM-IIITDM Jabalpur	Member
5.	Shri R. D. Sahay MHRD, New Delhi	Member
6.	Shri Navin Soi MHRD, New Delhi	Member
7.	Ram Phal Dwivedi Deputy Registrar, PDPM-IIITDM Jabalpur	Secretary

FC/2012:02:01	**Opening Remarks by the Chairman**

The Chairman, Prof. S. V. Raghavan welcomed all the members and asked the Director of the Institute to proceed with the overview report.

FC/2012:02:02	**Overview Report by the Director**

The Director presented the following overview report of the Institute.

The main emphasis of the Institute during the Financial Year 2011-12 was on building infrastructure to facilitate faculty and students by providing them all possible amenities. For the last two financial years, the Institute has shown good fund utilization performance.

The Ministry of HRD had sanctioned Rs. 55.00 Crores as Plan Grant for the Financial Year 2011-12, but by the end of financial year, Institute received Grant of Rs. 40 Crores and remaining Grant of Rs. 15 Crores was received in F.Y. 2012-13. Institute utilized Rs. 41.92 Crores for the F.Y. 2011-12 with payment liabilities of Rs. 2.17 Crores on account of equipment's, constructions etc. and work deposit payable to CPWD of Rs. 15.00 Crores . Major expenditure were incurred on the construction of buildings worth Rs. 2311 lakhs including Civil deposit work to CPWD (Rs. 1623 Lakhs), Lab Equipment of Rs. 115 lakhs, Office Equipment ofRs. 17.14 Lakhs, Furniture of Rs. 37.43 lakhs, Computer peripherals and software of Rs. 169.98 lakhs and Books and e-Journals of Rs. 137.31 lakhs. The remaining amount of Rs. 15 Crores received after 31 March 2012 has already been paid to CPWD for construction work for the Financial Year 2011-12 during the Financial Year 2012-13.

The annual audit of the Institute for the financial year 2011-12 was completed successfully by Principal Auditor General (M.P.), Gwalior in the month of June, 2012 and audit report of the Institute is awaited.

FC/2012:02:03	**Confirmation of the Minutes of FC/2012/1st meeting held on Jan 9, 2012.**

Finance Committee confirmed the minutes of FC/2012/1st meeting held on Jan 9, 2012.

FC/2012:02:04	**To consider the recommendations of Building and Works Committee meeting held on June 30, 2012 at PDPM IIITDM Jabalpur.**

B&WC/2012:02:04 - To consider the Revised Preliminary Estimate for the Work of Construction of Triple Seated Hall of Residence (Renamed as Hall of Residence- 3) at PDPM- IIITDM Jabalpur.

The Finance Committee deliberated on the Revised Preliminary Estimate (RPE) vetted by the CPWD, Bhopal andrecommended the RPE of Rs. 2159.23 lakhs (Rupees two thousand one hundred and fifty nine point two three lakhs)to the Board for consideration of an amount of Rs. 2159.23 lakhs (Rupees two thousand one hundred and fifty nine point two three lakhs only) against the original PE of Rs. 1690 lakhs (Rs. One thousand six hundred and ninety lakhs only).

B&WC/2012:02:05 - To consider the report of the reconciliation committee constituted to settle the disputes with the M/s. Kanvinde Rai & Chowdhary.

The Finance Committee discussed the report of reconciliation committee constituted to settle the dispute between M/s. Kanvinde Rai Chowdhary and the Institute regarding the claimed fee by them and recommended the same to the Board for approval as no extra cost was involved.

B&WC/2012:02:05 - Reporting items

The Finance Committee noted the works taken up at the Institute level during the period 01-01-12 to 30-5-2012 for an amount of Rs. 45.99 lakhs (Rs. forty five point nine nine lakhs) which were within the financial power of Director/Dean (P&D).

The meeting ended with a vote of thanks to the Chair.

forwarded for approval pl.

R. P. Dwivedi
Secretary,
Finance Committee

Prof. (Ms.) Aparajita Ojha, Director

Recommended and forwarded for kind approval please

AOjha
20-8-2012

21/8/2012

Prof. S. V. Raghavan, Chairman, FC/BOG

FC/2013:01:04	**To consider the following recommendations of Building & Works Committee held on February 02, 2013.** Copy of the minutes of the 2013/1st meeting of the B&WC is enclosed from **(page 08 to 14).** (1) B&WC/2013:1:03 - To consider the Revised Preliminary-cum-Detailed Estimate(RPDE) of Rs. 4,77,14,500/- (Rs. Four crore seventy seven lakhs fourteen thousand five hundred only) for the work of construction of Basket Ball Court Complex (Indoor) at PDPM-IIITDM Jabalpur **(Page No. 15 to 51).** (2) B&WC/2013:1.04 - To consider the Preliminary-cum-Detailed Estimate(PDE) of 18,41,24,400/-(Rs. Eighteen core forty one lakhs twenty four thousand four hundred only) for the work of construction of Roads and Services Network (Phase-II) at PDPM-IIITDM Jabalpur **(Page No. 52 to 75).** (3) B&WC/2013:1.05 - To consider the Preliminary-cum-Detailed Estimate(PDE) of Rs. 732.26 lakhs (Rs. Seven hundred thirty two point two six lakhs only)for the work of Electrical Networking System (Balance Work) at PDPM-IIITDM Jabalpur **(Page No. 76 to 91).** (4) B&WC/2013:1.06 – To consider the Preliminary Estimate (PE) of 17,90,73,300/- (Rs. Seventeen crore ninety lakh seventy three thousand three hundred only) for the work of construction of Technology Incubation Centre at PDPM-IIITDM Jabalpur**(Page No. 92 to 99).** (5) B&WC/2013:1.07 – To consider the Preliminary Estimate (PE) of Rs. 10,55,09200/- (Rs. Ten core fifty five lakh nine thousand two hundred only) for the work of construction of Multi Utility Centre at PDPM-IIITDM Jabalpur **(Page No. 100 to 105).** (6) B&WC/2013:1.09(a) To consider the Preliminary cum Detailed Estimate of Rs. 3,19,89,725/- (Rs. Three crore nineteen lakh eighty nine thousand seven hundred twenty five only), for P/I of Footpaths, Sewerage Line, Water Supply Lines, Storm Water, Drains & Cable Ducting along Ring Road **(Page No. 106 to 123).** **The recommendations of B&WC for the above may be considered for recommendation to the BOG.**

Minutes of 2013/1st Meeting of Building & Works Committee (B&WC) of PDPM Indian Institute of Information Technology, Design & Manufacturing Jabalpur held on Saturday, February 02, 2013 at 15:00 hrs. at the Conference Hall of the Institute.

Members Present:

1.	Prof. Aparajita Ojha, Director, PDPM-IIITDM Jabalpur	Chairperson
2.	Ms. Yatendra Kumar, Under Secretary MHRD, New Delhi	Nominee of Director (T) MHRD, GOI
3.	Prof. G.K.Sharma, IIT Gandhinagar	Member
4.	Prof. Puneet Tandon, Dean, Planning and Development PDPM-IIITDM, Jabalpur	Member
5.	Shri D.K. Pandey SE, MPPKVV Comp. Ltd., Jabalpur	Member
6.	Shri P.R. Patil, SE (Civil), BCC,CPWD, Bhopal	Member
7.	Dr. Atul Gupta, Member CAC, PDPM IIITDM	Special Invitee
8.	Dr. Dinesh Vishwakarma, Member CAC, PDPM IIITDM	Special Invitee
9.	Dr. Prabir Mukhopadhyay, Member CAC, PDPM IIITDM	Special Invitee
10.	Shri Sanjay Agrawal, SE(Elect.), BCEC,CPWD, Bhopal	Special Invitee
11.	Shri R.K. Choudhary, EE(Civil), JPD, CPWD, Jabalpur	Special Invitee
12.	Shri N.S. Rawat, EE (Elect.), Planning, CPWD, Bhopal	Special Invitee
13.	Shri P. Shukla,	Special Invitee

	AE, CPWD, Jabalpur	
14.	Shri Rajiv Agrawal, AE(Elect.), CPWD, Jabalpur	Special Invitee
15.	Shri S.K. Saini, Representative of M/s Architect Atelier, Chandigarh.	Special Invitee
16.	Shri Amit Saini Representative of M/s Architect Atelier, Chandigarh.	Special Invitee
17.	Shri A.B. Jadeja Representative of M/s Datta and Datta, Ahmedabad.	Special Invitee
18.	Shri V. K. Dubey EE (Civil), PDPM-IIITDM, Jabalpur	Institute Engineer
19.	Shri R.P. Dwivedi Deputy Registrar, PDPM-IIITDM, Jabalpur	Secretary

B&WC/2013:1.01 **Opening Remarks by the Chairperson,**

The Chairperson and the Director of the Institute Prof. Aparajita Ojha welcomed all the members and introduced the new members and special invitees with the other members of the Committee. Then she briefed the members, about recently finalized layout plan of the campus and requested Prof. Puneet Tandon (Dean, P&D) to present an overview of ongoing and future construction projects of the Institute. He presented the progress of the construction projects under execution and also gave an overview of projects planned in the current and next financial year. Further, he presented the long term plan of gradual development of the Institute infrastructure.

B&WC/2013:1.02 **Confirmation of Minutes of BWC/2012/2nd/ meeting of the Building & Works Committee held on June 30,2012**

The following comment was received from one of the members about the minutes of meeting.

1. Typing error at P-2 in the spelling of "M/s convince Roy" and is to be read as M/s. Kanvinde Rai.

Minutes of the BWC/2012/2nd meeting of B&WC, held on June 30, 2012 were confirmed with the above modification.

B&WC/2013:1.03 **To consider the Revised Preliminary cum Detailed Estimate (RPDE) for the work of Construction of Basket Ball Court Complex (Indoor) at PDPM-IIITDM Jabalpur.**

The vetted modified RPDE for the work, amounting to Rs. 4,77,14,500/- i/c 3% contingencies, 1% Labour Cess, 1% for quality assurance, 4% Service tax, and 5.612% Architect Fee, as received from the SE (Planning), BCC, CPWD, Bhopal was placed before the committee. Some of the members showed concern over the increase in the revised amount of Preliminary-cum-Detailed Estimates. The SE (Civil), BCC, CPWD, Bhopal clarified that the value of RPDE has been increased as compared to the original Preliminary cum Detailed Estimate, because of the following reasons.

1. The additions of some rooms and the approach way, in the building, to provide connectivity of the building with other parts of Student Activity Centre, as proposed by the consultant, which would not be required for the remaining part of Student Activity Center (SAC).
2. Some enhanced scope of work in the original work of Basket Ball Court Complex at PDPM-IIITDM Jabalpur.
3. Because of shifting of building site to protect existing trees; there is deviation in the quantities of cuts / fills.

After deliberations, it was concluded that the Revised Preliminary cum Detailed Estimate as forwarded by the SE (Planning), BCC, CPWD, Bhopal was justified. The value of the architect fee as mentioned in the estimate was corrected from 5% (+12.36% service tax) to 4.5%(+12.36% service tax). Accordingly the corrected value of the estimate i.e. Rs. 4,74,83,000/- (Rs. Four crore seventy four lacs eighty three thousand only) was accepted by the Committee.

The Committee recommended the Revised Preliminary cum Detailed Estimate (RPDE) for the work of Construction of Basket Ball Court Complex (Indoor) at PDPM-IIITDM Jabalpur for a value of 4,74,83,000/- (Rs. Four Crore seventy four lacs eighty tree thousand only) to the Finance Committee for considerationand onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

B&WC/2013:1.04 **To consider the Preliminary cum Detailed Estimate (PDE) for the work of Construction of Roads and Service Network Phase - II at PDPM-IIITDM, Jabalpur.**

The vetted estimate by the SE, BCC, CPWD, Bhopal for a value of Rs.18,41,24,400/- including 3% contingencies, 1% for quality assurance, 1% for Labor Cess, 4% for service tax was placed before the committee and was discussed at length. The portion of road / service network taken into consideration in the estimate was brought into the knowledge of the members. It was explained that all the services including roads, sewer lines, storm water drainage, water supply lines, recycled water lines, side footpaths, culverts, RCC hume pipe etc. for about 7.5 km of length have been covered in the estimate. The architect fee was not covered in the vetted estimate received from the CPWD, the same was suggested to be added. The committee accepted the estimate for a total value of 19,26,71,800/- (Rs. Nineteen crore twenty six lacs seventy one thousand eight hundred only) including 4.5% Architect Fee + service tax @12.36%.

The Committee recommended the Preliminary cum Detailed Estimate (PDE) for the work of Construction of Roads and Service Network Phase - II at PDPM-IIITDM, Jabalpur for a value of 19,26,71,800/- (Rs. Nineteen crore twenty six lacs seventy one thousand eight hundred only) to the Finance Committee for consideration and onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

B&WC/2013:1.05 **To consider the Preliminary cum Detailed Estimate (PDE) for the work of Construction of Electrical Networking System (Balance work) at PDPM-IIITDM, Jabalpur.**

The Preliminary cum Detailed Estimate for the above works, as prepared by M/S Datta & Datta Associates was discussed at length. The provisions made in the estimate to provide HT supply lines to the whole campus with two additional CSS at Hostel area, three additional CSS along with HT cables in Academic area and two CSS with HT cable in Residential areas were explained with justification for each CSS. It was pointed out that because of expected load in academic area, one more CSS would be required in future. It was decided that the HT cables should be laid out for the additional CSS required in future. The SE (Elect.), BCEC, CPWD, Bhopal confirmed that the cost of estimate submitted by M/s Datta and Datta Associate i.e. Rs.732.26 lacs is justified. However,he stated that some minor corrections in the proposed scheme are to be incorporated and that will not affect the project cost. The committee accepted

the estimate amounting to Rs.732.26 lacs including 1% for Labour Cess, 3% contingencies and 5% Architect fees.(+ 12.36% service tax).

The value of the architect fee as mentioned in the estimate was corrected to 4.5% (+12.36% service tax). Accordingly, the corrected value of the estimate i.e.728.67 lacs (Rs. Seven hundred twenty eight point six seven lacs only) was accepted by the committee.

The Committee recommended the Preliminary cum Detailed Estimate (PDE) for the work of Construction of Electric Networking System (Balance work) of PDPM IIITDM Jabalpur for a value of Rs.728.67 lacs (Rs. Seven hundred twenty eight point six seven lacs only) to the Finance Committee for consideration and onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

B&WC/2013:1.06 **To consider the Preliminary Estimate (PE) for the work of Construction of Technology Incubation Centre at PDPM-IIITDM, Jabalpur**

The vetted estimate from the CPWD amounting to the modified value of Rs.17,90,73,300/- including 58% cost index, 4% service tax, 1% for quality assurance, 1% for Labor Cess,3% contingences and 5% Architect fee (+12.36% service tax) was placed before the committee. Some of the members of the Committee were of the opinion that the cost is on higher side. Then, the SE(Civil), CPWD, Bhopal explained, that the apparently high cost of vetted estimate is due to recently revised cost index at Jabalpur, from 148% to 158%. The committee deliberated on the preliminary drawings for the work, the estimate and the cost per sqm. for the proposed building. It was further discussed that part of the building has air conditioning requirement and the same has been included in the proposal. After deliberation, the members were satisfied with justification provided by the CPWD officials and the architect on the cost of the building. The architect fee as taken in the estimate was corrected from 5% to 4.5% (+service tax 12.36%). Accordingly, the PE (with corrected architect fee) for a value of Rs.17,82,32,000/- (Rs. Seventeen crore eighty two lacs thirty two thousand) was accepted by the committee.

The Committee recommended the Preliminary Estimate (PE) for the work of Construction of Technology Incubation Centre for a value of Rs. 17,82,32,000/- (Rs. Seventeen crore eighty two lacs thirty two thousand) to the Finance Committee for consideration and onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

B&WC/2013:1.07 **To consider the Preliminary Estimate (PE) for the work of Construction of Multi Utility Centre at PDPM-IIITDM, Jabalpur**

The vetted estimate from the CPWD, amounting to the value of Rs.10,55,09,200/- including 58% cost index, 4% service tax, 1% for quality assurance, 1% for labour cess, 3% contingency and 5% (+service tax) architect fee was placed before the committee. The SE(Civil), CPWD, Bhopal explained that the cost of vetted estimate has been increased due to the recently revised cost index at Jabalpur, from 148% to 158% and also due to inclusion of 4% service tax. The committee deliberated the Preliminary Drawings for the work, the estimate and the cost per sqm for the proposed building. The architect fee as taken in the estimate was corrected from 5% to 4.5% (+service tax 12.36%). Accordingly the PE (with corrected architect fee) for a value of Rs. 10,50,00,700/- (Rs. Ten crore fifty lacs seven hundred only) was accepted by the committee.

The Committee recommended the Preliminary Estimate (PE) for the work of Construction of Multi Utility Centre for a value of Rs. 10,50,00,700/- (Rs. Ten crore fifty lacs seven hundred only) to the Finance Committee for consideration and onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

B&WC/2013:1.08 **To consider the Preliminary Estimate for the work of Construction of Professional Lab Complex at PDPM-IIITDM, Jabalpur.**

The drawings proposed for the building, the value of the estimateand per sq. m. cost etc. were discussed at length. The members deliberated on the area requirement for various disciplines and future plans for introduction of new programmes. After deliberations, it was concluded that the area of this building could be reduced in accordance to the actual area requirements and thus, the cost of the building could be reduced substantially. It was decided to review the requirements proposed by different disciplines at the Institute level in consultation with the SE(C), BCC, CPWD Bhopal and members of CAC so as to reduce the building area / cost of the estimate.

In view of the urgent requirement of the building it was decided to hold another meeting of the Building and Works Committee at a short notice to consider the modified proposal for the Preliminary Estimate for the work of Construction of Professional Lab Complex at PDPM-IIITDM, Jabalpur after getting reviewed, the area requirements and

the cost estimation at the Institute level. It was decided to hold the meeting in the month of February 2013 only. The proposal was deferred with the above note.

B&WC/2013:1.09 **Any other item with the permission of the chair.**

B&WC/2013:1.09 (a) **To consider the Preliminary cum Detailed Estimate for P/l Footpaths, Sewerage Line, Water Supply Lines, Storm Water, Drains & Cable Ducting along Ring Road.**

The Preliminary cum Detailed Estimate for the work, amounting to Rs.3,19,89,725/-(Rs. Three crore nineteen lacs eighty nine thousand seven hundred twenty five) including, 1% for Labour Cess, 3 % Contingencies, 4.5% (+Service tax) Architect fee,as prepared by M/s Datta and Datta Associates was discussed at length. The members were informed that the Administrative Approval and Expenditure Sanction for the Ring Road has already been accorded but the provisions for other services were not incorporated in the earlier estimate. Now the work for services networking along the road side has been proposed so that both the works (road and service network on the ring road) may be taken up simultaneously. The SE(C), BCC, CPWD, Bhopal informed that they have checked the estimate and the estimated value is justified. The committee accepted the estimate for the above mentioned work after going through its details.

The Committee recommended the Preliminary cum Detailed Estimate (PDE) for the work of Construction of Footpaths, Sewerage line, Water Supply Lines, Storm water, Drains & Cable Ducting along Ring Road for a value of Rs. 3,19,89,725/- (Rs. Three crore nineteen lacs eighty nine thousand seven hundred twenty five) to the Finance Committee for consideration and onward recommendation to the BOG for Administrative Approval and Expenditure Sanction.

The meeting ended with a vote of thanks to the Chair and other members.

-Sd-
R.P. Dwivedi
Deputy Registrar & Secretary

-Sd-
Prof. Aparajita Ojha
Chairperson, B&WC

भारत सरकार
कार्यालय अधीक्षण अभियंता
भोपाल केन्द्रीय परिमण्डल, कें. लो. नि. वि.
निर्माण सदन 1,52 ए, अरेरा हिल्स, भोपाल–462011

पत्र क्र. 23(175)/BCC/2011/12/ भोपाल/दिनांक 31/01/2013

प्रति,

डिप्टी रजिस्टार
इंन्डीयन इंस्टीटूट ऑफ टेक्नालाजी
जबलपुर

विषयः- :—C/o Basket Ball Court (Indoor) at PDPM,IIIT D&M, Jabalpur (MP)

महोदय

विषयांकित कार्य के लिए रू. 4,77,14,500/- मय कन्टीनजेन्सी के लिए प्रारंभिक प्राक्कलन आवश्यक कारवाई हेतु संलग्न कर आपकी ओर प्रेषित है । आपसे अनुरोध है कि उपरोक्त कार्य का सक्षम अधिकारी से प्रशासकनक अनुमोदन प्राप्त कर स्वीकृत प्राक्कलन की एक प्रतिहस्ताक्षरित प्रति के साथ इस कार्यालय को प्रषित करें ।

संलग्न :– प्रारंभिक प्राक्कलन

कार्यपालक अभियंता(योजना)
भोपाल केन्द्रीय परिमण्डल,
कें. लो. नि. वि., भोपाल

प्रतिलिपिः–

1. कार्यपालक अभियता भोपाल केन्द्रीय मंडल–2 भोपाल को सुचनार्थ ।

कार्यपालक अभियंता(योजना)

भारत सरकार

अधीक्षण अभियंता ,भो.के.प.
केंद्रीय लोक निर्माण विभाग
52- ए, अरेरा हिल्स
भोपाल

पुनर्निर्धारित प्रारम्भिक प्राक्कलन

प्रा. संख्या :- ५7 /अ.अ../भोकेप./2012–2013.

NAME OF WORK: - C/o Basket Ball Court (Indoor) or PDPM, IIIT, D&M Jabalpur(M.P)

लागत मूल्य :- ₹ 4,77,14,500/- i/c 3% contingencies

GOVERNMENT OF INDIA
CENTRAL PUBLIC WORKS DEPARTMENT

State : M.P. Division : JPD Jabalpur
Branch : B&R

Estimate No.: VII/ SE/2012-13.

Name of Work :- **C/o Basket Ball Court(Indoor) for PDPM, IIIT,D&M Jabalpur(M.P.)**

Major Head	Minor Head	Detailed Head
	Deposit	

This revised preliminary estimate has been prepared by Er. R.K. Chaudhary , Executive Engineer, Jabalpur Project Division, CPWD, Jabalpur and processed by Er. R.K. Gupta Executive Engineer (P), Bhopal Central Circle, CPWD, Bhopal for the probable cost of **Rs.4,77,14,500/- including 3% contingencies.**

// REPORT //

HISTORY :- This revised preliminary estimate amounting to **Rs. 4,77,14,500/-**including 3% contingencies has been framed to cover the probable cost of above mentioned work and to obtain revised A/A & E/S of the competent authority. The requisition for RPE has been communicated by the institute vide letter No. IIITDM/B&W/2013/01/14 dated 14-01-2013.

The original P.E. amounting to Rs.2,30,64,000/- (including contingencies) was sent to institute by the Superintending Engineer, BCC, Bhopal vide letter no. 23(175)BCC/2010/2668 dated 26-11-2010.On the basis of original PE the institute has granted A/A & E/S for Rs.2,19,34,666/- vide letter no. IIITDMJ/B&W/11/04/08 dated 28-04-2011. After receiving A/A & E/S, the work was awarded vide letter no. 54(522)/EE/BCD-II/2011/2366 dated 08-11-2011 with the tendered amount to Rs.1,94,56,079/-. During the execution of the work, the original site considered for estimate has been changed and due to additional retaining wall required to construct at the basement of the new site.It has also been decided to construct additional grid of the building . Due to that consultant has issue the modified drawing for the work. Therefore it was noticed that the quantities / items available in the agreement were quite insufficient to complete/ function the Basketball court. Accordingly a number of discussions have been made with the client department, M/s Dutta & Dutta, consultant of the work and the higher authorities and it has been decided to submit RPE . The IIITDM has also requested vide letter dated 14-01-2013 (copy enclosed) to submit RPE and continued the work to make the building complete. Accordingly the RPE has been prepared.

DESIGN & SCOPE :- The revised preliminary cum detailed estimate has been framed based on the following architectural /structural drawings, received from Director, PDPM IIIT D&M Jabalpur (MP) and developed by Architects Datta Associates on behalf of the PDPM IIIT D&M Jabalpur (MP) with suitable modification as per site condition and to complete / function the basket ball court.

	Drawings	Drg.No
1.	Lower ground floor plan	SA-W-03
2.	Ground floor plan	SA-W-03
3.	Upper ground floor plan	SA-W-03
4.	Entrance foyer top slab with porch slab- sports complex	EF-DD-01
5.	Entrance foyer with porch sports complex	EF-DD-02
6.	View Elevation sports complex	W-05
7.	Slab over upper ground floor beam & slab detail(+5700)-Basketball Hall	05-A
8.	Slab over upper ground beam & slab detail -Basket ball Hall	05-B
9.	Truss detail(+5700) -Basket ball	06A
10.	Cabin room slab & water tank detail- Basket Ball	07
11.	Stair detail –Basket Ball	08-A

12 Foundation columns for pergola & pergola beam detail basket ball PRG01

Specifications: The work shall be carried out as per CPWD specification 2009 Vol I to II with upto date correction slips

Rate Based on Delhi Schedule of Rates 2012 & Market rates.
Cost Rs. **4,77,14,500/** including 3% contingencies

T&P : No special T&P is required.
Land : Available with client department.

W.C. Estt : Will be met out from the of contingencies.

Method : By contract.

Time : 06 months.

Assistant Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Name of Work:Revised Preliminary estimate for Construction of Basket Ball Court(Indoor) for PDPM, IIIT D&M Jabalpur (M.P.)

S.No.	Item	Specifications
1	**STRUCTURE**	
A	Structure	RCC Frame structure with isolated footing column and retaining wall upto GF.In lower Ground floor RCC Wall. RCC frame structure and steel trusses with precoated GI sheet roofing.
B	Brick work	Brick masonary with FPS bricks of CD 35 . 230mm /115mm thick brick wall (upto 3.65ht)
C	Inside Plaster	12mm thick(1:6) plaster on wall
D	Ceilling Plaster	6mm tick (1:3) plaster on ceilling
E	Outside Plaster	18 mm thick cement plaster in two coats
2	**DOORS**	
A	Entrance Door	Aluminium frame & glass shutter with floor spring.
B	Toilet/Pantry/Record Room	PVCdoor frame and PVC door shutter.
C	Rooms Door	Pressed steel door frames with flush door shutter.
3	**WINDOWS AND VENTILATORS**	
A	Windows	Anodised aluminium.
B	Ventilation	Aluminium frame with glass louvers.
4	**GRILL**	
A	Windows	Flats bars or any other sections
5	**FLOORING**	
A	Basket Ball Hall	CC flooring
B	Rooms	Vitrified tiles 600x600 size.
C	Stair	Kota stone

6	**TOILET**	
A	Flooring	Ceramic glazed tile 300x 300
B	Dado	Ceramic glazed tile.
C	Counter top	Granite stone.
7	**WATER PROOFING**	
A	Sunken Area	20mm plaster with water proofing compound, 400 micron PVC sheet.
B	Roof	Integral cement based water proofing treatment
8	**PAINTS**	
A	Internal Walls	Cement based putty with plastic paint.
B	Exterior Paint	Finishing walls with Acrylic Smooth exterior paint
C	Steel	Delux Multi surface paint
D	Steel Truss	Delux Multi surface paint
9	**PLUMBING**	
A	Rain Water	PVC pipes
B	External Water Supply	GI pipe
C	Internal Water Supply	CPVC piping
10	**SANITARY**	
A	W.C Fittings	White vitreous Indian type . White PVC flushing cistern with manually controlled device
B	Urinal	White vitreous range of two & three urinal with White PVC flushing cistern with manually controlled device
C	Wash Basin	White vitreous 550x440mm with pair of CP brass pillar trap.
D	Soil pipe	Centrifugally cast spun iron pipe and fittings
11	DRAINAGE	100mm SW pipe & 150 mm SW pipe with CC 1:5:10 upto haunches.

Assistant Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Name of Work:Revised Preliminary estimate for Construction of Basket Ball Court(Indoor) for PDPM, IIIT D&M Jabalpur (M.P.)

ABSTRACT OF COST

SUMMARY OF ORIGINAL P.E

SUMMARY OF REVISED P.E

S.No.	Description	Amount		Amount
1	Civil Works	12632525		30543038
2	Plumbing works	1405536		2013193
	(A)	**14038061**		**32556231**
3	Electrical works (External service connection @ 5% of (A)	701903.05	External service connection @ 3.75% of (A)	1220859
4	Electrical works (Internal connections @ 12.5% of (A)	1754757.625		4069529
	Total	16494721.68		37846619
	Add Cost index @ 122 Jabalpur	3628838.769		0
	Add anticipated enhancement @10%			3784662
	(B)	20123560.44		41631281
	Architects Fees @ ~~5.612%~~ 5.056% on B	1129334.212		~~2336347~~ 2104878
	Add contingencies 3% on B	603706.8133		1248938
	Add labour Cess 1% on B	201235.6044		416313
	Add Quality assurance 1% on B	201235.6044		416313
	Add service tax4% on B	804942.4177		1665251
	Grand Total	**23064015.1**		~~47714445~~ 47482974

Say Rs. ~~4,77,14,500/-~~ 47483000/-

(Rs. Four Crore Seventy Seven Lacs Forty Thousand Five Hundred only)

Assistant Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Superintending Engineer
Bhopal Central Circle,
Central P.W.D., Bhopal.

N/W Revised Preliminary estimate for Construction of Basket Ball Court(Indoor) for PDPM, IIIT D&M Jabalpur (M.P.)
Estimate for Civil Work

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expected	Rate	Amount	DSR 2012	Remarks
1	EARTH WORK					2					
1.1	Earth work in excavation by mechanical means (Hydraulic excavator)/ manual means over areas (exceeding 30cm in depth. 1.5m in width as well as 10 sqm on plan) including disposal of excavated earth, lead upto 50m and lift upto 1.5m, disposed earth to be levelled and neatly dressed.					2.6					Qty exceeded due to change in scope of work and drawing.
1.1.1	All kinds of soil	2721	cum	101.85	277134.00	2.6.1	10223	129.35	1322345.05	2.6.1	
1.1A	Earth work in excavation by mechanical means (Hydraulic excavator) / manual means in foundation trenches or drains (not exceeding 1.5 m in width or 10 sqm on plan) including dressing of sides and ramming of bottoms, lift upto 1.5 m, including getting out the excavated soil and disposal of surplus excavated soil as directed, within a lead of 50 m. (a) All kinds of soil	0	cum	0.00	0.00	2.8.1	350	130.8	45780	2.8.1	Item proposed as per site condition. Item not included in PE
1.2	Filling available excavated earth (excluding rock) in trenches, plinth, sides of foundations etc. in layers not exceeding 20cm in depth, consolidating each deposited layer by ramming and watering, lead up to 50 m and lift upto 1.5 m.	1405	cum	45.70	64209.00	2.25	2706	83.8	226762.8	2.25	Qty exceeded due to change in scope of work and drawing.
1.3	Extra for every additional lift of 1.5 m or part thereof in					2.26				2.26	
1.3.1	All kinds of soil.	1234	cum	18.90	23323.00	2.26.1	3744	34.6	129542.4	2.26.1	..do..
1.4	Supplying and filling in plinth with Jamuna sand under floors including, watering, ramming consolidating and dressing complete.	50	cum	301.50	15075.00	2.27	100	749.3	74930	2.27	..do..
1.5	Surface dressing of the ground including removing vegetation and in equalities not exceeding 15 cm deep and disposal of rubbish, lead upto 50 m and lift upto 1.5 m.					2.28			0		
1.5.1	All kinds of soil.	6000	100 sqm	512.10	30726.00	2.28.1	6000	935.25	56115	2.28.1	
	Sub-Total				**410467.00**				**1855475.25**		
2	CONCRETE WORK					4					
2.1	Providing and laying in position cement concrete of specified grade excluding the cost of centring and shuttering - All work upto plinth level					4.1					

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
2.1.1	1:4:8 (1 Cement : 4 coarse sand : 8 graded stone aggregate 40 mm nominal size).	54	cum	2449.00	132246.00	4.1.8	302	3,357.40	1013934.8	4.1.10	Item changed per agreement ter .e PCC - 1:5:10
	Sub-Total				**132246.00**				**1013935**		
3	REINFORCED CEMENT CONCRETE					5					
3.1	Providing and laying in position specified grade of reinforced cement concrete excluding the cost of centring, shuttering, finishing and reinforcement - All work upto plinth level :					5.1					
3.1.1	1:1½:3 (1 cement : 1½ coarse sand : 3 graded stone aggregate 20 mm nominal size)	56	cum	3732.00	208992.00	5.1.2	552	6333.4	3496036.8	5.1.2	Item proposed as per agreement item i.e. RCC - 1:1:2
3.2	Reinforced cement concrete work in walls (any thickness), including attached pilasters, buttresses, plinth and string courses, fillets, columns, pillars, piers, abutments, posts and struts etc. upto floor five level excluding cost of centring, shuttering, finishing and reinforcement :					5.2				5.2	
3.2.1	1:1½:3 (1 cement : 1½ coarse sand : 3 graded stone aggregate 20 mm nominal size)	329	cum	4092.35	1346383.00	5.2.2	125	6974.3	871787.5	5.2.1	..do..
3.2.1A	Reinforced cement concrete work in beams, suspended floors, roofs having slope up to 15° landings, balconies, shelves, chajjas, lintels, bands, plain window sills, staircases and spiral stair cases up to floor five level excluding the cost of centering, shuttering, finishing and reinforcement with 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size)	0	cum	0.00	0.00	5.3	292	7123.65	2080105.8	5.3	Item proposed as per agreement item . Item not included in PE
3.3	Centring and shuttering including strutting, propping etc. and removal of form for :					5.9					
3.3.1	Foundations, footings, bases of columns, etc. for mass concrete.	200	sqm	119.25	23850.00	5.9.1	200	166.9	33380	5.9.1	

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expectec	Rate	Amount	DSR 2012	Remarks
3.3.2	Walls (any thickness) including attached pilasters, buttresses, plinth and string courses etc.	424	sqm	180.40	76490.00	5.9.2	1637	285.15	466790.55	5.9.2	Qty exceeded due to change in scope of work and drawing.
3.3.3	Suspended floors, roofs, landings, balconies and access platform.	3909	sqm	187.35	732351.00	5.9.3	2000	311.2	622400	5.9.3	Qty estimatedas per due to change in scope of work & drawing
3.3.4	Lintels, beams, plinth beams, girders, bressumers and cantilevers.	579	sqm	162.65	94174.00	5.9.5	1081	262.25	283492.25	5.9.5	Qty, exceeded due to change in scope of work and drawing.
3.3.5	Columns, Pillars, Piers, Abutments, Posts and Struts.	575	sqm	238.40	137080.00	5.9.6	1153	365.6	421536.8	5.9.6	.do
3.3.6	Stairs, (excluding landings) except spiral-staircases.	62	sqm	204.00	12648.00	5.9.7	197	326.3	64281.1	5.9.7	.do..
3.3.7	Edges of slabs and breaks in floors and walls.					5.9.16			0		
3.3.7.1	Under 20 cm wide	40	metre	61.10	2444.00	5.9.16.1	100	99.45	9945	5.9.16.1	.do..
3.4	Reinforcement for R.C.C. work including straightening, cutting, bending, placing in position and binding all complete. Upto plinth level.					5.22			0		
3.4.1	Thermo-Mechanically Treated bars.	40051	kg	42.70	1710178.00	5.22.6	47200	62.25	2938200	5.22.6	.do..
3.4.1A	Steel reinforcement for R.C.C. work including straightening, cutting, bending, placing in position and binding all complete above plinth level.								0		
.4.1A.1	Thermo-Mechanically Treated bars.	0	0	0.00	0.00	5.22A.6	59700	62.25	3716325	5.22A.6	Item proposed as per agreement item .Item not included in PE
	Sub-Total				4344590.00				15004280.8		
4	MARBLE WORK					8					

SlNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
4.1	Extra for providing opening of required size & shape for wash basins/ kitchen sink in kitchen platform, vanity counters and similar location in marble/Granite/stone work including necessary holes for pillar taps etc. including rubbing and polishing of cut edges etc. complete.	6	each	151.00	906.00	8.5	16	281.1	4497.6	8.5	Qty exceeded due to change in scope of work and drawing.
4.1A	Providing and fixing 18mm thick gang saw cut mirror polished premoulded and prepolished) machine cut for kitchen platforms, vanity counters, window sills , facias and similar locations of required size of approved shade, colour and texture laid over 20mm thick base cement mortar 1:4 (1 cement : 4 coarse sand) with joints treated with white cement, mixed with matching pigment, epoxy touch ups, including rubbing, curing, moulding and polishing to edges to give high gloss finish etc. complete at all levels.										
4.1A.1	Raj Nagar Plain white marble/ Udaipur green marble/ Zebra black marble										
.1A.1.1	Area of slab over 0.50 sqm	0	sqm	0.00	0.00	8.2.1.2	40	1980.8	79232	8.2.1.2	tem proposed as per agreement item.Item not included in PE
4.2A.1	Granite of any colour and shade								0		
2.A.1.1	Area of slab over 0.50 sqm	0	sqm	0.00	0.00	8.2.2.2	12	3083.4	37000.8	8.2.2.2	.do..
4.1B	Providing edge moulding to 18mm thick marble stone counters, Vanities etc. including machine polishing to edge to give high gloss finish etc. complete as per design approved by Engineer-in-Charge.								0		
4.1B.1	Granite work.	0	metre			8.3.2	20	178.75	3575	8.3.2	.do..
	Sub-Total				**906.00**				**124305.4**		
5	WOOD AND P.V.C. WORK					9					
5.1	Providing and fixing ISI marked flush door shutters conforming to IS: 2202 (Part I) decorative type, core of block board construction with frame of 1st class hard wood and well matched teak 3 ply veneering with vertical grains or cross bands and face veneers on both faces of shutters					9.20					

SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expected	Rate	Amount	DSR 2012	Remarks
		Original P.E.					Revised P.E.				
5.1.1	35 mm thick including ISI marked Stainless Steel butt hinges with necessary screws.	35	sqm	1473.50	51573.00	9.20.1	43	2159.05	92839.15	9.20.1	Qty exceeded due to change in scope of work and drawing
5.1A	Providing & Fixing decorative high pressure laminated sheet of plain / wood grain in gloss / matt / suede finish with high density protective surface layer and reverse side of adhesive bonding quality conforming to IS : 2046 Type S including cost of adhesive of approved quality										
5.1A.1	1.0 mm thick.	0	sqm				85	596.3	50685.5	9.127.2	Item proposed as per agreement item,item not included in PE
5.2	Providing and fixing M.S. grills of required pattern in frames of windows etc. with M.S. flats, square or round bars etc. all complete.					9.48					
5.2.1	Fixed to steel windows by welding.	35	kg	59.25	2074.00	9.48.1	2236	90.75	202917	9.48.1	Qty exceeded due to change in scope of work and drawing.
5.3	Providing and fixing bright finished brass 100 mm mortice latch and lock with 6 levers and a pair of lever handles with necessary screws etc. complete (best make of approved quality).	22	each	332.65	7318.00	9.76	20	472.25	9445	9.76	As per actua requirement
5.4	Providing and fixing IS : 3564 - having brand logo with ISI embossed on the body, door weight upto 35 kg. and door width upto 700mm. Aluminium die cast body tubular type universal hydraulic door closer with necessary accessories and screws etc. complete.	22	each	610.60	13433.00	9.83	20	662.8	13256	9.83	As per actua requirement
5.5	Providing and fixing aluminium sliding door bolts ISI marked anodised (anodic coating not less than grade AC 10 as per IS : 1868) transparent or dyed to required colour or shade with nuts and screws etc. complete :					9.96					
5.5.1	250x16 mm	22	each	134.10	2950.00	9.96.2	36	168.95	6082.2	9.96.2	Qty exceeded due to change in scope of work and drawing

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
5.6	Providing and fixing aluminium tower bolts ISI marked anodised (anodic coating not less than grade AC 10 as per IS : 1868) transparent or dyed to required colour or shade with necessary screws etc. complete :					9.97					
5.6.1	300x10 mm	44	each	71.45	3144.00	9.97.1	40	100.4	4016	9.71.1	As per actual requirement
5.6.2	200x10 mm	76	each	52.00	3952.00	9.97.3	40	71.05	2842	9.97.3	do
5.7	Providing and fixing aluminium handles ISI marked anodised (anodic coating not less than grade AC 10 as per IS : 1868) transparent or dyed to required colour or shade with necessary screws etc. complete :					9.1					
5.7.1	125 mm	44	each	48.80	2147.00	9.100.1	58	62.5	3625	9.100.1	Qty exceeded due to change in scope of work and drawing.
5.7.2	100 mm	76	each	35.30	2683.00	9.100.2	50	49.55	2477.5 0	9.100.2	
5.8	Providing and fixing aluminium hanging floor door stopper ISI marked anodised (anodic coating not less than grade AC 10 as per IS : 1868) transparent or dyed to required colour and shade with necessary screws etc. complete.					9.101					
5.8.1	Twin rubber stopper	9	each	53.90	485.00	9.101.2	20	71.55	1431	9.101.2	Qty exceeded due to change in scope of work and drawing.
5.9	Providing and fixing aluminium casement stays ISI marked anodised (anodic coating not less than grade AC 10 as per IS : 1868) transparent or dyed to required colour and shade with necessary screws etc. complete.	14	each	47.55	666.00	9.102	122	62.4	7612.8	9.102	..do..
5.1	Providing and fixing factory made P.V.C. door frame of size 50x47mm with a wall thickness of 5mm, made out of extruded 5mm rigid PVC foam sheet mitred at corners and joined with 2 Nos. of 150mm long brackets of 15x15mm M.S. square tube, the vertical door profiles to be reinforced with 19x19mm M.S. square tube of 19 gauge, EPDM rubber gasket weather seal to be provided through out the frame. The door frame to be fixed to the wall using M.S. screws of 65/100mm size complete as per manufacturers specification and direction of Engineer-in-Charge.	21	metre	353.10	7415.00	9.119	80	404.6	32368	9.119	.do..
5.11	Providing and fixing to existing door frames.					9.120					

SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expectec	Rate	Amount	DSR 2012	Remarks
		Orginal P.E.					Revised P.E.				
5.11.1	30mm thick factory made solid both side Pre-laminated panel PVC door shutter consisting of frame made out of M.S. tubes of 19 gauge thickness and size of 19mm x 19mm for styles and 15x15mm for top & bottom rails. M.S. frame shall have a coat of steel primers of approved make and manufacture . M.S. frame covered with 5mm thick heat moulded Pre-laminated PVC 'C' channel of size 30mm thickness, 70mm width out of which 50mm shall be flat and 20mm shall be tapered in 45degree angle on either side forming styles; and 5mm thick, 95mm wide PVC sheet out of which 75mm shall be flat and 20mm shall be tapered in 45 degree on the inner side to form top and bottom rail and 115mm wide PVC sheet out of which 75mm shall be flat and 20mm shall be tapered on both sides to form lock rail. Top, bottom and lock rails shall be provided either side of the panel. 10mm (5mm x 2) thick, 20mm wide cross PVC sheet be provided as gap insert for top rail & bottom rail. paneling of 5mm thick both side Pre-laminated PVC sheet to be fitted in the M.S. frame welded/ sealed to the styles & rails with 7mm (5mm+2mm) thick x 15mm wide PVC sheet beading on inner side, and joined together with solvent cement adhesive. An additional 5mm thick PVC strip of 20mm width is to be stuck on the interior side of the 'C' Channel using PVC solvent adhesive etc. complete as per direction of Engineer-in-charge. Manufacturer's specification & drawing (for W.C. and bathroom door shutter).	12	sqm	2580.35	30964.00	9.120.2	25	2958	73950	9.120.2	..do..
	Sub-Total				**128804.00**				**503547.15**		
6	STEEL WORK					10					
6.1	Providing and fixing pressed steel door frames confirming to IS: 4351 manufactured from commercial mild steel sheet of 1.25 mm thickness including hinges jamb, lock jamb, bead and if required angle threshold of mild steel angle of section 50x25mm, or base ties of 1.25mm pressed mild steel welded or rigidly fixed together by mechanical means, adjustable lugs with split end tail to each jamb including steel butt hinges 2.5mm thick with mortar guards, lock strike-plate and shock absorbers as specified and applying a coat of approved steel primer after pre-treatment of the surface as directed by Engineer-in-charge:					10.14					
6.1.1	Profile B	43	metre	251.90	12091.00	10.14.1	122	346.75	42303.5	10.14.1.1	do
6.2	Steel work in built up tubular trusses including cutting, hoisting fixing in position and applying a priming coat of approved steel primer, welded and bolted including special shaped washers etc. complete.					10.16					

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expected	Rate	Amount	DSR 2012	Remarks
6.2.1	Hot finished welded type tubes	33000	kg	61.50	2029500.00	10.16.1	1230	85.1	104673	10.16.1	Item proposed as per agreement item
6.2A	Steel work welded in built up sections/ framed work, including cutting, hoisting, fixing in position and applying a priming coat of approved steel primer using structural stee etc. as required.										
6.2A.1	In trusses , frames, guard bar, ladder, railings, brackets, gates and similar works.	0	Kg	0.00	0.00	10.25.2	33000	77.9	2570700	10.25.2	Item proposed as per agreement item. Item not included in PE
6.3	Providing and fixing M.S. round holding down bolts with nuts and washer plates complete.	5000	kg	52.05	260250.00	10.19	2000	67.8	135600	10.19	As per actual requirement
6.4	Providing and fixing 1mm thick M.S. sheet door with frame of 40x40x6 mm angle iron and 3 mm M.S. gusset plates at the junctions and corners, all necessary fittings complete, including applying a priming coat of approved steel primer. (a) Using M.S. angels 40x40x6 mm for diagonal braces	0	Sqm	0.00	0.00	10.5.1	8	2551.45	20411.6	10.5.1	Item proposed as per agreement item
6.5	Providing and fixing circular/ Hexagonal cast iron or M.S. sheet box for ceiling fan clamp, of internal dia 140 mm. 73 mm height, top lid of 1.5 mmthick M.S. sheet with its top surface hacked for proper bonding, top lid shall be screwed into the cast iron/ M.S. sheet box by means of 3.3 mm dia round headed screws, one lock at the corners. Clamp shall be made of 12 mm dia M.S. bar bent to shape as per standard drawing.	0	Each	0.00	0.00	10.18	40	117.45	4698	10.18	..do..
6.6	Providing and fixing hand rail of approved size by welding etc. to steel ladder railing, balcony railing, staircase railing and similar works,including applying priming coat of approved steel primer.										
6.6.1	M.S. tube	0	Kg	0.00	0.00	10.26.1	1632	86.45	141086.4	10.26.1	..do..
	Sub-Total				**2301841.00**				**3019472.5**		
7	FLOORING										

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
7.1	Cement concrete flooring 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate) finished with a floating coat of neat cement including cement slurry, but excluding the cost of nosing of steps etc. complete.					11.3					
7.1.1	40mm thick with 20mm nominal size stone aggregate.	1404	sqm	192.95	270902.00	11.3.1	1074	280.05	300773.7	11.3.1	do.
7.1A	Providing and fixing glass strips in joints of terrazo/ cement concrete floors.										
7.1A.1	40 mm wide and 4 mm thick	0	metre	0.00	0.00	11.13.1	1074	29.4	31575.6	11.13.1	do.
7.2	40 mm thick fine dressed stone flooring over 20 mm (average) thick base of cement mortar 1:5 (1cement : 5 coarse sand) with joints finished flush.					11.28					
7.2.1	Red sand stone	1404	sqm	309.40	434398.00	11.28.1	0	0	0		
7.3	Providing and fixing Ist quality ceramic glazed wall tiles conforming to IS : 15622 (thickness to be specified by the manufacturer) of approved make in all colours, shades except burgundy, bottle green, black of any size as approved by Engineer-in-Charge in skirting, risers of steps and dados over 12 mm thick bed of cement Mortar 1:3 (1 cement : 3 coarse sand) and jointing with grey cement slurry @ 3.3kg per sqm including pointing in white cement mixed with pigment of matching shade complete.	91	sqm	556.60	50651.00	11.36	377	724.25	273042.25	11.36	do.
7.4	Providing and laying Ceramic glazed floor tiles 300x300 mm (thickness to be specified by the manufacturer) of 1st quality conforming to IS : 15622 of approved make in colours such as White, Ivory, Grey, Fume Red Brown, laid on 20 mm thick Cement Mortar 1:4 (1 Cement : 4 Coarse sand) including pointing the joints with white cement and matching pigment etc., complete.	138	sqm	598.65	82614.00	11.37	105	764.55	80277.75	11.37	do.
7.5	Providing and laying vitrified floor tiles in different sizes (thickness to be specified by the manufacturer) with water absorption's less than 0.08% and conforming to IS : 15622 of approved make in all colours and shades, laid on 20mm thick cement mortar 1:4 (1 cement : 4 coarse sand) including grouting the joints with white cement and matching pigments etc., complete.					11.41					do.
7.5.1	Size of Tile 60x60 cm	547	sqm	1031.85	564422.00	11.41.2	345	1337.1	461299.5	11.41.2	do.
7.6	Kota stone slab flooring over 20 mm (average) thick base laid over and jointed with grey cement slurry mixed with pigment to match the shade of the slab, including rubbing and polishing complete with base of cement mortar 1 : 4 (1 cement : 4 coarse sand) :										
7.6.1	25 mm thick	0	sqm	0.00	0.00	11.26.1	1021	345.7	353559.7	11.26.1	do.

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
7.7	Kota stone slabs 20 mm thick in risers of steps, skirting, dado and pillars laid on 12 mm (average) thick cement mortar 1:3 (1 cement: 3 coarse sand) and jointed with grey cement slurry mixed with pigment to match the shade of the slabs, including rubbing and polishing complete.	0	sqm	0.00	0.00	11.27	144	954.1	137390.4	11.27	..do..
7.8	Extra for pre finished nosing in treads of steps of Kota stone/ sand stone slab.	0	mtr	0.00	0.00	11.31	234	52.45	12273.3	11.34	..do..
	Sub-Total				**1402987.00**				**2262192.2**		
8	ROOFING										
8.1	Providing corrugated G.S. sheet roofing including vertical/ curved surface fixed with polymer coated J or L hooks, bolts and nuts 8 mm diameter with bitumen and G.I. limpet washers or with G.I. limpet washers filled with white lead and including a coat of approved steel primer and two coats of approved paint on overlapping of sheets complete upto any pitch in horizontal/ vertical or curved surfaces) excluding the cost of purlins, rafters and trusses and including cutting to size and shape wherever required.					12.1					Qty exceeded due to change in scope of work and drawing
8.1.1	1.00mm thick with zinc coating not less than 275gm/m²	959	sqm	612.85	587723.00	12.1.1	1255	878.45	1102454.75	12.1.1	do
8.2	Providing and fixing precoated galvanised steel sheet roofing accessories 0.50 mm (+ 0.05 %) total coated thickness, Zinc coating 120 grams per sqm as per IS: 277, in 240 mpa steel grade, 5-7 microns epoxy primer on both side of the sheet and polyester top coat 15-18 microns using self drilling/ self tapping screws complete	0		0.00	0.00						Item proposed as per agreement item. Item not included in PE
8.2.1	Ridges plain (500 - 600mm)		metre	0.00	0.00	12.51.1	34	620.75	21105.5	12.51.1	
8.2.2	Gutter .(600 mm over all girth)	0	metre	0.00	0.00	12.51.6	67	750.7	50296.9	12.51.6	do
8.3	Providing and fixing on wall face unplasticised Rigid PVC rain water pipes conforming to IS : 13592 Type A, including jointing with seal ring conforming to IS : 5382, leaving 10 mm gap for thermal expansion. (i) Single socketed pipes.										
8.3.1	110 mm diameter	0	metre	0.00	0.00	12.41.2	133	206.9	27517.7	12.41.2	do

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
8.4	Providing and fixing on wall face unplasticised - PVC moulded fittings/ accessories for unplasticised Rigid PVC rain water pipes conforming to IS : 13592 Type A, including jointing with seal ring conforming to IS : 5382, leaving 10 mm gap for thermal expansion.								0		
8.4.1	Bend 87.5°										
8.4.1.1	110 mm bend	0	Each	0.00	0.00	12.42.5.2	22	156.95	3452.9	12.42.5.2	do
8.4.2	Shoe (Plain)										
8.4.2.1	110 mm Shoe	0	Each	0.00	0.00	12.42.6.2	22	287.05	6315.1	12.42.6.2	do
8.5	Providing and fixing to the inlet mouth of rain water pipe PTMT (an Engineering Thermoplastic) grating square (Slit) 150 mm square with a height of 8 mm and weighing not less than 100 gms.	0	Each	0.00	0.00	12.46	25	96.65	2416.25	12.46	do
	Sub-Total				**587723.00**				**1213559.1**		
9	FINISHING					13					
9.1	12 mm cement plaster of mix :					13.1					
9.1.1	1:6 (1 cement : 6 fine sand)	2833	sqm	67.65	191652.00	13.1.2	1808	112.5	203400	13.1.2	As per actual requirement
9.2	15 mm cement plaster on the rough side of single or half brick wall of mix :					13.2			0		
9.2.1	1:4 (1 cement : 4 fine sand)	1535	sqm	90.35	138687.00	13.2.1	1808	130.2	235401.6	13.2.1	Item proposed as per agreement i.e CP - 1:6
9.3	6 mm cement plaster of mix :					13.16			0		
9.3.1	1:3 (1 cement : 3 fine sand)	952	sqm	62.15	59167.00	13.16.1	2600	101	262600	13.16.1	
9.4	Providing and applying plaster of paris putty of 2 mm thickness over plastered surface to prepare the surface even and smooth complete	3775	sqm	47.20	178180.00	13.26	0	0	0	0	
9.5	Finishing walls with Acrylic Smooth exterior paint of required shade :					13.46			0		
9.5.1	New work (Two or more coat applied @ 1.67 ltr/10 sqm over and including base coat of water proofing cement paint applied @ 2.20 kg/ 10 sqm).	1535	sqm	50.40	77364.00	13.46.1	1617	67.5	109147.5	13.46.1	Qty exceeded due to change in scope of work and drawing.
9.6	Finishing walls with Deluxe Multi surface paint system for interiors and exteriors using Primer as per manufacturers specifications :					13.48					

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
9.6.1	Painting Steel work with Deluxe Multi Surface Paint to give an even shade. Two or more coat applied @0.90 ltr/10 sqm over an under coat of primer applied @ 0.80 ltr/ 10 sqm of approved brand or manufacture	2500	sqm	53.35	133375.00	13.48.3	404	70.4	28441.6	13.48.3	As per actual requirement
9.7	Wall painting with plastic emulsion paint of approved brand and manufacture to give an even shade:					13.60					
9.7.1	Two or more coats on new work	3775	sqm	40.05	151189.00	13.60.1	5616	60.25	338364	13.60.1	Qty exceeded due to change in scope of work and drawing.
9.8	18 mm cement plaster in two coats under layer 12 mm thick cementplaster 1:5 (1 cement: 5 coarse sand) and a top layer 6 mm thick cement plaster 1:3 (1 cement : 3 coarse sand) finished rough with sponge.	0	sqm	0.00	0.00	13.12	1617	158.25	255890.25	13.12	Item proposed as per agreement item. Item not included in PE
9.9	Providing and applying Ready Mix Birla/J.K.wall care putty @ 2mm thickness , over the plastered wall surface to prepare the surface even and smooth complete.	0	sqm	0.00	0.00	Basedon DSRitem no. 13.80	5616	76.05	427096.8	Basedon DSRitem no. 13.80	co
	Sub-Total				**929614.00**				**1860341.75**		
10	ALUMINIUM WORK					21					

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
10.1	Providing and fixing aluminium work for doors, windows, ventilators and partitions with extruded built up standard tubular sections/ appropriate Z sections and other sections of approved make conforming to IS: 733 and IS : 1285, fixed with rawl plugs and screws or with fixing clips, or with expansion hold fasteners including necessary filling up of gaps at junctions, at top, bottom and sides with required EPDM rubber/neoprene gasket etc. Aluminium sections shall be smooth, rust free, straight, mitred and jointed mechanically wherever required including cleat angle, Aluminium snap beading for glazing / panelling, C.P. brass / stainless steel screws, all complete as per architectural drawings and the directions of Engineer-in-charge. (Glazing and panelling to be paid for separately) :					21.1					
10.1.1	For fixed portion.										
10.1.1.1	Anodised aluminium (anodised transparent or dyed to required shade according to IS: 1868, Minimum anodic coating of grade AC 15)	450	kg	290.45	130703.00	21.1.1 21.1.1.1	1600	358.3	573280	21.1.1.1	Qty exceeded due to change in scope of work and drawing.
10.1.2	For shutters of doors, windows & ventilators including providing and fixing hinges/ pivots and making provision for fixing of fittings wherever required including the cost of EPDM rubber / neoprene gasket required (Fittings shall be paid for separately).					21.1.2			0		
10.1.2.1	Anodised aluminium (anodised transparent or dyed to required shade according to IS: 1868, Minimum anodic coating of grade AC 15)	307	kg	310.45	95308.00	21.1.2.1	1200	406.5	487800	21.1.2.1	Qty exceeded due to change in scope of work and drawing.
10.2	Providing and fixing glazing in aluminium door, window, ventilator shutters and partitions etc. with EPDM rubber/ neoprene gasket etc. complete as per the architectural drawings and the direct ons of engineer-in-charge . (Cost of aluminium snap beading shall be paid in basic item) :					21.3			0		
10.2.1	With float glass panes of 5.50 mm thickness	112	sqm	673.55	75438.00	21.3.2	160	905.75	144920	21.3.2	co
10.2.2	With float glass panes of 8 mm thickness	0	sqm	0.00	0.00		7.2	1227.8	8840.16	21.3.3	tem proposed as per agreement tem tem not ncluded n PE

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
10.3	Providing and fixing double action hydraulic floor spring of approved brand and manufacture IS : 6315 - having brand logo embossed on the body/plate with double spring mechanism and door weight upto 125 kg, for doors including cost of cutting floors as required, embedding in floors and cover plates with brass pivot and single piece M.S. sheet outer box with slide plate etc. complete as per the direction of Engineer-in-charge.					21.4					
10.3.1	With stainless steel cover plate - minimum 1.25 mm thickness	4	each	1732.65	6930.60	21.4.1	2	1953.1	3906.2	21.4.1	As per actual requirement
	Sub-Total				**308379.60**				**1218746.36**		
11	WATER PROOFING					22					
11.1	Providing and laying water proofing treatment in sunken portion of WCs, bathroom etc., by applying cement slurry mixed with water proofing cement compound consisting of applying : a) First layer of slurry of cement @ 0.488 ksqm mixed with water proofing cement compound @ 0.253 kg/sqm. This layer will be allowed to air cure for 4 hours. b) Second layer of slurry of cement @ 0.242 ksqm mixed with water proofing cement compound @ 0.126 kg/sqm. This layer will be allowed to air cure for 4 hours followed with water curing for 48 hours. The rate includes preparation of surface, treatment and sealing of all joints, corners, junctions of pipes and masonry with polymer mixed slurry.	133	sqm	143.85	19132.00	22.5	118	465.45	54923.1	22.5	co

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty Expectec	Rate	Amount	DSR 2012	Remarks
11.2	Providing and laying integral cement based water proofing treatment including preparation of surface as required for treatment of roofs, balconies, terraces etc consisting of following operations: a) Applying a slurry coat of neat cement using 2.75 kg/sqm of cement admixed with water proofing compound conforming to IS. 2645 and approved by Engineer-in-charge over the RCC slab including adjoining walls upto 300 mm height including cleaning the surface before treatment. b) Laying brick bats with mortar using broken bricks/brick bats 25 mm to 115 mm size with 50% of cement mortar 1:5 (1 cement : 5 coarse sand) admixed with water proofing compound conforming to IS : 2645 and approved by Engineer-in-charge over 20 mm thick layer of cement mortar of mix 1:5 (1 cement :5 coarse sand) admixed with water proofing compound conforming to IS : 2645 and approved by Engineer-in-charge to required slope and treating similarly the adjoining walls upto 300 mm height including rounding of junctions of walls and slabs c) After two days of proper curing applying a second coat of cement slurry using 2.75 kg/ sqm of cement admixed with water proofing compound conforming to IS : 2645 & approved										
	thick jointless cement mortar of mix 1:4 (1 cement :4 coarse sand) admixed with water proofing compound conforming to IS : 2645 and approved by Engineer-in-charge including laying glass fibre cloth of approved quality in top layer of plaster and finally finishing the surface with trowel with neat cement slurry and making pattern of 300x300 mm square 3 mm deep. e) The whole terrace so finished shall be flooded with water for a minimum period of two weeks for curing and for final test. All above operations to be done in order and as directed and specified by the Engineer-in-Charge :										Item proposed as per agreement item. Item not included in PE
11.2.1	With average thickness of 120 mm and minimum thickness at khurra as 65 mm.	0	sqm	0.00	0.00	22.7.1	290	786.7	228143	22.7.1	
	Sub-Total				**19132.00**				**283066.1**		
12	HORTICULTURE & LANDSCAPING					23					
12.1	Supplying and stacking of good earth at site including royalty and carriage upto 5 km (earth measured in stacks will be reduced by 20% for payment).	1500	cum	144.05	216075.00	23.2	1500	260.7	391050	23.2	
	Sub-Total				**216075.00**				**391050**		
	Total DSR Item				**10782768.00**				[illegible]		

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
	NON SCHEDULE ITEMS										
1	Granite Stone flooring with 18mm thick granite stone flooring in Treads Landing rectangular shape(minimum size of stone should be 0.45 sqm and one dimension not less than 700mm)over 20mm (average) thick base of cement mortar 1:4 (1 cement :4 coarse sand) laid and jointed with grey cement slurry including rubbing and polishing complete.	8	Sqm	3767	30136		0	0	0		Not required at site
2	18mm thick prepolished granite flooring risers and skirting (upto 30cm height) over 12mm thick bed of cement mortar 1:3 (1 cement :3 coarse sand) & jointed with grey cement including pointing with white cement mixed with pigment matching the shade of grainte stone all complete and as directed.	29	Sqm	3741	108489		0	0	0		Not required at site
3	Brick work with FPS bricks of class designation 35 in superstructure above plinth level upto floor V level in all shapes and sizes in cement mortar 1:6 (1 cement :6 coarse sand) complete in all respects as per drawings / specifications and to the entire satisfaction of the Engineer-in-Charge.	475	Cum	3540	1681500		**292**	**3876.15**	1131835.8	Based on DSR item no. 6.4.2	As per actual requirement
4	Brick work with F.P.S. bricks of class designation 35 in foundation and plinth in:								0		
	Cement mortar 1:6 (1 cement : 6 coarse sand)	0	Cum	0	0		80	3316.55	265324	Based on DSR item no. 6.1.2	Item proposed as per agreement item. Item not included in PE
5	Half brick masonry with F.P.S. bricks of class designation 35 in superstructure above plinth level up to floor V level.								0		
	Cement mortar 1:4 (1 cement :4 coarse sand)	0	sqm	0	0		200	476.85	95370	Based on DSR item no. 6.13.2	do
6	Providing & fixing double glazed hermetically sealed insulating glass in aluminium doors, windows, ventilators & glazing etc including providing EPDM gasket, perforated aluminium spacers desiccants, silicon, sealants etc ass peer manufacturer's specifications drawings & direction of Engineer-in-Charge. Double insulating glass(6mm thick heat reflective toughened glass + 12 air gap +6mmclear float toughened glass)				0						

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty Expectec	Rate	Amount	DSR 2012	Remarks
	Triple insulating glass (for structural glazing) with 6mm thick Heat effective Azure/Cool-lite toughened glass on outer face having 12mm all gap and 6mm clear float complete toughened glass on inner face.	7	Sqm	4234	29638		0	0	0		Not required at site
7	Providing & fixing 10mm thick clear multi wall polycarbonate sheets of Polygal, Lexan, Sun light, Tufflight Dalpaion make of approved quality and shade in desired shape in roofing including the cost of EPDM gaskets, sealing tape, aluminium profile and all necessary accessories complete as directed by Engineer-in-Charge. The detailed calcuiations based on relevant codal provisions and carrying out water penetration test as per standards followed in India. The sheets shall be laid on the purlins to atrue plane, with the lines parallel or normal to the sides of the areato be covered unless otherwise required as in special shaped roofs. The joints shall be fixed and covered with 50x3mm anodized aluminium flats fitted with Hilti Bolts with washersas per joinery details The whole work is										
	through reputed and approved vendor having experience in polycarbonate work in Commercial/Govt/Corporate buildings as per architectural elevation drawings including filling of joins with silicon sealant and also with masonary/RCC work, at all heights including double heights, straight or curved etc completein all respect (Framing to be paid separately)	0	Sqm	0	0		90	3339.3	300537	Non DSR based on item no 9.13 of TS No 15 [illegible] [illegible] paste	Item required due to change in drawing
	Total NSDR Items				1849763				1793066.8		
	Grand Total of DSR items & NSDR items				12632525.00				30543038.41		

Assistant Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Original Estimate

N/W Revised Preliminary estimate for Construction of Basket Ball Court(Indoor) for PDPM, IIIT D&M Jabalpur (M.P.)
Estimate for Sanitary & Plumbing works (DSR items)

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
1	EARTH WORK					2					
1.1	Earth work in excavation by mechanical means (Hydraulic excavator)/ manual means over areas (exceeding 30cm in depth. 1.5m in width as well as 10 sqm on plan) including disposal of excavated earth, lead upto 50m and lift upto 1.5m, disposed earth to be levelled and neatly dressed.					2.6					
1.1.1	All kinds of soil	15	cum	101.85	1528.00	2.6.1	15	129.35	1940.25	2.6.1	
1.2	Excavating trenches of required width for pipes, cables, etc including excavation for sockets, and dressing of sides, ramming of bottoms, depth upto 1.5 m including getting out the excavated soil, and then returning the soil as required, in layers not exceeding 20 cm in depth including consolidating each deposited layer by ramming, watering, etc. and disposing of surplus excavated soil as directed, within a lead of 50 m :					2.10					
1.2.1	All kinds of soil					2.10.1					
1.2.1.1	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	150	metre	115.05	17258.00	2.10.1.2	150	165.6	24840	2.10.1.2	
1.3	Filling available excavated earth (excluding rock) in trenches, plinth, sides of foundations etc. in layers not exceeding 20cm in depth, consolidating each deposited layer by ramming and watering, lead up to 50 m and lift upto 1.5 m.	10	cum	45.70	457.00	2.25	10	83.8	838	2.25	
	Sub-Total				**19243.00**				**27618.25**		
2	ROOFING					12					
2.1	Providing and fixing to the inlet mouth of rain water pipe cast iron grating 15 cm diameter and weighing not less than 440 grams.	3	each	23.40	70.00	12.44	0	0	0	0	Item already taken in SH Roofing
	Sub-Total				**70.00**				**0**		

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
3	SANITARY INSTALLATIONS					17					
3.1	Providing and fixing water closet squatting pan (Indian type W.C. pan) with 100mm sand cast Iron P or S trap, 10 litre low level white P.V.C. flushing cistern with manually controlled device (handle lever) conforming to IS : 7231, with all fittings and fixtures complete including cutting and making good the walls and floors wherever required :					17.1					Qty exceeded due to change in scope of work and drawing
3.1.1	White Vitreous china Orissa pattern W.C. pan of size 580x440mm with integral type foot rests.	8	each	2304.65	18437.00	17.1.1	16	2964.1	47425.6	17.1.1	
3.2	Providing and fixing white vitreous china flat back or wall corner type lipped front urinal basin of 430x260x350mm and 340x410x265mm sizes respectively with automatic flushing cistern with standard flush pipe and C.P. brass spreaders with brass unions and G.I clamps complete, including painting of fittings and brackets, cutting and making good the walls and					17.4					
3.2.1	Range of three urinal basins with 10litre white P.V.C. automatic flushing cistern.	16	each	4491.60	71866.00	17.4.3	4	6229.9	24919.6	17.4.3	Qty estimatedas per due to change in scope of work & drawing
3.2.2	Range of two urinal basins with 5 litre white P.V.C. automatic flushing cistern	0	each	0.00		17.4.2	4	4 652.80	18611.2	17.4.2	Item proposed as per agreement item item not included in
3.3	Providing and fixing wash basin with C.I. brackets, 15 mm C.P. brass pillar taps,32 mm C.P. brass waste of standard pattern, including painting of fittings and brackets, cutting and making good the walls wherever require :					17.7					

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
3.3.1	White Vitreous China Wash basin size 550x400 mm with a pair of 15 mm C.P. brass pillar taps.	8	each	1176.10	9409.00	17.7.3	18	1679.95	30239.1	17.7.3	Qty. exceeded due to change in scope of work and drawing.
3.4	Providing and fixing 100 mm sand cast iron grating for gully trap.	8	each	16.45	132.00	17.29	18	24.6	442.8	17.29	..do..
3.5	Providing and fixing mirror of superior glass (of approved quality) and of required shape and size with plastic moulded frame of approved make and shade with 6 mm thick hard board backing :					17.32					Qty exceeded due to change in scope of work and drawing.
3.5.1	Rectangular shape 453x357mm	8	each	465.10	3721.00	17.32.2	18	598.3	10769.4	17.32.2	
3.6	Providing and fixing 600x120x5mm glass shelf with edges round of supported on anodised aluminium angle frame with C.P. brass brackets and guard rail complete fixed with 40 mm long screws, rawl plugs etc., complete.	8	each	216.70	1734.00	17.33	18	341.25	6142.5	17.33	..do..
3.7	Providing and fixing toilet paper holder :					17.34					
3.7.1	Vitreous china	8	each	173.00	1384.00	17.34.2	18	259.75	4675.5	17.34.2	..do..
3.8	Providing and fixing soil, waste and vent pipes :					17.35					
3.8.1	100 mm dia.					17.35.1					
3.8.1.1	Centrifugally cast (spun) iron socketed pipe as per IS: 3989.	575	metre	730.40	419980.00	17.35.1.2	275	857.3	235757.5	17.35.1.2	..do..
3.9	Providing and fixing M.S. holder-bat clamps of approved design to Sand Cast iron/cast iron (spun) pipe embedded in and including cement concrete blocks 10x10x10cm of 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm nominal size) including cost of cutting holes and making good the walls etc. :					17.37					
3.9.1	For 100 mm dia. Pipe	115	each	65.35	7515.00	17.37.1	115	112.5	12937.5	17.37.1	
3.1	Providing and fixing plain bend of required degree.					17.39					
3.10.1	100 mm					17.39.1					
3.10.1.1	Sand cast iron S&S as per IS : 3989	85	each	236.40	20094.00	17.39.1.2	30	296.35	8890.5	17.39.1.2	Qty. estimatedas per due to change in scope of work & drawing

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
3.11	Providing and fixing heel rest sanitary bend					17.4					
3.11.1	100 mm dia					17.40.1					
3.11.1.1	Sand cast iron S&S as per IS - 3989	12	each	286.35	3436.00	17.40.1.2	10	382.8	3828	17.40.1.2	do
3.12	Providing and fixing single equal plain junction of required degree :					17.44					
3.12.1	100x100x100 mm					17.44.1					
3.12.1.1	Sand cast iron S&S as per IS - 3989	15	each	442.00	6630.00	17.44.1.2	20	522.85	10457	17.44.1.2	Qty exceeded due to change in scope of work and drawing
3.13	Providing and fixing terminal guard:					17.56					
3.13.1	100 mm					17.56.1					
3.13.1.1	Sand cast iron S&S as per IS - 3989	45	each	194.60	8757.00	17.56.1.2	12	244.1	2929.2	17.56.1.2	Qty estimatedas per due to change in scope of work & drawing
3.14	Providing and fixing collar:					17.57					
3.14.1	100 mm					17.57.1					
3.14.1.1	Sand cast iron S&S as per IS - 3989	15	each	202.70	3041.00	17.57.1.2	30	238.25	7147.5	17.57.1.2	Qty exceeded due to change in scope of work and drawing.
3.15	Providing and fixing M.S. stays and clamps for sand cast iron/ centrifugally cast (spun) iron pipes of diameter :					17.59					
3.15.1	100 mm	8	each	48.25	386.00	17.59.1	12	61.7	740.4	17.59.1	do
3.16	Providing and fixing trap of self cleansing design with screwed down or hinged grating with or without vent arm complete, including cost of cutting and making good the walls and floors :					17.60					
3.16.1	100 mm inlet and 75 mm outlet					17.60.2					
3.16.1.1	Sand cast iron S&S as per IS - 3989	8	each	573.35	4587.00	17.60.2.1	20	838.85	16[illegible]	17.60.2.1	do

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
3.17	Cutting chases in brick masonry walls for following diameter sand cast iron/ centrifugally cast (spun) iron pipes and making good the same with cement concrete 1:3:6 (1 cement : 3 coarse sand :6 graded stone aggregate 12.5 mm nominal size) including necessary plaster and pointing in cement mortar 1:4 (1 cement : 4 coarse sand) :					17.61					
3.17.1	100 mm dia.	75	metre	152.45	11434.00	17.61.1	0	0	0		Not required as per site condition.
3.18	Painting sand cast iron/ centrifugally cast (spun) iron soil, waste vent pipes and fittings with paint of any colour such as chocolate grey, or buff etc. over a coat of primer (of approved quality) for new work :					17.65					
3.18.1	100 mm diameter pipe	250	metre	17.85	4462.50	17.65.1	200	28.75	5750	17.65.1	Qty. est. mistedas per due to change in scope of work & drawing
3.19	Providing and fixing PTMT liquid soap container 109mm wide, 125mm high and 112mm distance from wall of standard shape with bracket of the same materials with snap fittings of approved quality and colour. weighing not less than 105 gms.	4	each	164.65	659.00	17.71	18	180.1	3241.8	17.71	Qty. exceeded due to change in scope of work and drawing
	Sub-Total				**597664.50**				**451682.1**		
4	WATER SUPPLY					18					
4.1	Providing and fixing Chlorinated Polyvinyl Chloride (CPVC) pipes, having thermal stability for hot & cold water supply including all CPVC plain & brass threaded fittings i/c fixing the pipe with clamps at 1.00 m spacing. This includes jointing of pipes & fittings with one step CPVC solvent cement and testing of joints complete as per direction of Engineer in Charge. Internal work - Exposed on wall					18.7					
4.1.1	15 mm nominal outer dia .Pipes.	55	metre	97.95	5387.00	18.7.1	75	133.95	10046.25	18.7.1	do
4.1.2	25 mm nominal outer dia .Pipes.	85	metre	150.40	12784.00	18.7.3	200	197.9	39580	18.7.3	do
4.1.3	40 mm nominal outer dia .Pipes.	105	metre	275.05	28880.00	18.7.5	250	348.25	90545	18.7.5	do

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
4.2	Providing and fixing G.I. pipes complete with G.I. fittings including trenching and refilling etc. External work :					18.12					
4.2.1	25 mm dia. nominal bore	15	metre	156.85	2353.00	18.12.3	55	209.4	11517	18.12.3	do
4.2.2	50 mm dia. nominal bore	30	metre	280.10	8403.00	18.12.6	200	355.95	71190	18.12.6	do
4.2.3	65 mm dia. nominal bore	50	metre	356.15	17808.00	18.12.7	50	453.55	22677.5	18.12.7	do
4.3	Making connection of G.I. distribution branch with G.I. main of following sizes by providing and fixing tee, including cutting and threading the pipe etc. complete :					18.13					
4.3.1	50 to 80 mm nominal bore	2	each	423.20	846.00	18.13.2	2	630.15	1260.3	18.13.2	
4.4	Providing and fixing ball valve (brass) of approved quality, High or low pressure, with plastic floats complete :					18.18					
4.4.1	25 mm nominal bore	4	each	385.90	1544.00	18.18.3	10	421.65	4216.5	18.18.3	do
4.5	Providing and fixing gun metal non- return valve of approved quality (screwed end) :					18.19					
4.5.1	65 mm nominal bore					18.19.5					
4.5.1.1	Horizontal	2	each	1282.10	2564.00	18.19.5.1	2	1681.95	3363.9	18.19.5.1	
4.6	Providing and fixing brass ferrule with C.I. mouth cover including boring and tapping the main :					18.2					
4.6.1	25 mm nominal bore	8	each	243.70	1950.00	18.20.3	4	331.25	1325	18.20.3	Qty. est. exceeded due to change in scope of work & drawing
4.7	Providing and fixing uplasticised PVC connection pipe with brass unions :					18.21					
4.7.1	45 cm length					18.21.2					
4.7.1.1	15 mm nominal bore	8	each	44.75	358.00	18.21.2.1	20	61.7	1234	18.21.2.1	Qty. exceeded due to change in scope of work and drawing

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty	Rate	Amount	DSR 2012	Remarks
4.8	Constructing masonry Chamber 60x60x75 cm, inside with 75 class designation brick work in cement mortar 1:4 (1 cement : 4 coarse sand) for sluice valve, with C.I. surface box 100mm. top diameter, 160 mm bottom diameter and 180 mm deep (inside) with chained lid and RCC top slab 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm nominal size) necessary excavation foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) and inside plastering with cement mortar 1:3 (1 cement : 3 coarse sand) 12 mm thick finished with a floating coat of neat cement complete as per standard design :					18.33					
4.8.1	With F.P.S. bricks	1	each	3595.30	3595.00	18.33.1	4	5392.9	21571.6	18.33.1	as
4.9	Providing and fixing G.I. Union in existing G.I. pipe line, cutting and threading the pipe and making long screws including excavation, refilling the earth or cutting of wall and making good the same complete wherever required :					18.47					
4.9.1	20 mm nominal bore.	4	each	170.10	680.00	18.47.2	8	282.9	2263.2	18.47.2	as
4.9.2	65 mm nominal bore.	4	each	528.30	2113.00	18.47.7	4	742.55	2970.2	18.47.7	as
4.9.3	80 mm nominal bore.	4	each	607.30	2429.00	18.47.8	0	0	0	18.47.8	Not required as per site condition
4.1	Providing and fixing C.P. brass bib cock of approvec quality conforming to IS:8931					18.49					
4.10.1	15 mm nominal bore.	75	each	207.00	15525.00	18.49.1	40	397.5	15900	18.49.1	Qty. estimatedas per due to change of scope of work & drawing
4.11	Providing and fixing C.P. brass long body bib cock of approved quality conforming to IS standards and weighing not less than 690 gms.					18.51					

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
4.11.1	15 mm nominal bore	12	each	253.95	3047.40	18.51.1	20	430.6	8612	18.51.1	Qty. exceeded due to change in scope of work and drawing.
4.12	Providing and fixing C.P. brass stop cock (concealed) of standard design and of approved make conforming to IS:8931.					18.52					
4.12.1	15 mm nominal bore.	8	each	262.55	2100.40	18.52.1	20	426.55	8531	18.52.1	do
4.13	Providing and fixing C.P. brass angle valve for basin mixer and geyser points of approved quality conforming to IS:8931					18.53					
4.13.1	15 mm nominal bore	8	each	347.65	2781.00	18.53.1	20	449.35	8987	18.53.1	do
4.14	Providing and fixing C.I. double acting air valve of approved quality with bolts, nuts, rubber insertions etc. complete (The tail pieces, tapers etc if required will be paid separately) :					18.59					
4.14.1	50 mm dia	1	each	3615.70	3616.00	18.59.1	2	4018.15	8036.3	18.59.1	do
4.15	Providing and fixing enclosed type water meter (bulk type) conforming to IS : 2373 and tested by Municipal Board complete with bolts, nuts, rubber insertions etc. (The tail pieces if required will be paid separately) :					18.6					
4.15.1	80 mm dia nominal bore	1	each	2448.40	2448.00	18.60.1	0	0	0	18.60.1	Not required as per site condition
4.16	Providing and fixing PTMT Ball cock of approved quality, colour and make complete with Epoxy coated aluminium rod with L.P./ H.P.H.D. plastic ball.					18.62					
4.16.1	50mm nominal bore, 242mm long. Weighing not less than 1240 gms.	8	each	1338.30	10706.00	18.62.5	18	1391.5	25047	18.62.5	Qty. exceeded due to change in scope of work and drawing

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
4.17	Cutting holes upto 15x15 cm in R.C.C. floors and roofs for passing drain pipe etc. and repairing the hole after insertion of drain pipe etc. with cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) including finishing complete so as to make it leak proof.	10	each	82.25	823.00	18.77	0	0	0	18.77	Not required as per site condition
	Sub-Total				**132740.80**				**358873.75**		
5	DRAINAGE					19					
5.1	Providing, laying and jointing glazed stoneware pipes class SP1 with stiff mixture of cement mortar in the proportion of 1:1 (1 cement : 1 fine sand) including testing of joints etc. complete :					19.1					
5.1.1	100 mm diameter	10	metre	105.90	1059.00	19.1.1	20	150.1	3002	19.1.1	Qty exceeded due to change in scope of work and drawing
5.1.2	150mm diameter	0	metre	0.00	0.00	19.1.2	20	219.05	4381	19.1.2	Item proposed as per agreement ref. Item not included in PE
5.2	Providing and fixing square-mouth S.W. gully trap class SP1 complete with C.I. grating brick masonry chamber with water tight C.I. cover with frame of 300 x300 mm size (inside) the weight of cover to be not less than 4.50 kg and frame to be not less than 2.70 kg as per standard design :					19.4					
5.2.1	150 x 100 mm size P type.					19.4.2					
5.2.1.1	With F.P.S. bricks class designation 75	8	each	961.95	7696.00	19.4.2.1	18	1278.3	23009.4	19.4.2.1	Qty exceeded due to change in scope of work and drawing

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
5.3	Providing and laying non-pressure NP2 class (light duty) R.C.C. pipes with collars jointed with stiff mixture of cement mortar in the proportion of 1:2 (1 cement : 2 fine sand) including testing of joints etc. complete :					19.6					
5.3.1	150 mm dia. R.C.C. pipe	75	metre	202.85	15214.00	19.6.2	75	254.5	19087.5	19.6.2	
5.3.2	250 mm dia. R.C.C. pipe	105	metre	258.20	27111.00	19.6.3	270	342.45	92461.5	19.6.3	do
5.4	Constructing brick masonry manhole in cement mortar 1:4 (1 cement : 4 coarse sand) R.C.C. top slab with 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size), foundation concrete 1:4:8 mix (1 cement : 4 coarse sand : 8 graded stone aggregate 40mm nominal size) inside plastering 12mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished with floating coat of neat cement and making channels in cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm nominal size) finished with a floating coat of neat cement complete as per standard design :					19.7					
5.4.1	Inside size 90x80 cm and 45 cm deep including C.I. cover with frame (light duty) 455x610 mm internal dimensions total weight of cover and frame to be not less than 38 kg (weight of cover 23 kg and weight of frame 15 kg) :					19.7.1					
5.4.1.1	With F.P.S. bricks with class designation 75	12	each	5383.70	64604.00	19.7.1.1	24	7132	171168	19.7.1.1	do
5.5	Extra for depth for manholes					19.8					
5.5.1	Size 90x80 cm					19.8.1					
5.5.1.1	With F.P.S. bricks class designation 75	1	metre	2654.00	2654.00	19.8.1.1	5	4061.7	20308.5	19.8.1.1	do
5.6	Extra depth for circular type manhole 1.22m internal dia (at bottom) beyond 1.68 m to 2.29 m :					19.12					
5.6.1	With F.P.S. bricks class designation 75	1	metre	2954.75	2955.00	19.12.1	5	4522.3	22611.5	19.12.1	do

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
5.7	Providing orange colour safety foot rest of minimum 6 mm thick plastic encapsulated as per IS : 10910 on 12mm dia steel bar conforming to IS : 1786 having minimum cross section as 23 mmx25mm and over all minimum length 263 mm and width as 165mm with minimum 112 mm space between protruded legs having 2 mm tread on top surface by ribbing or chequering besides necessary and adequate anchoring projections on tail length on 138 mm as per standard drawing and suitable to with stand the bend test and chemical resistance test as per specifications and having manufacture's permanent identification mark to be visible even after fixing, including fixing in manholes with 30x20x15 cm cement concrete block 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 20 mm nominal size) complete as per design.	8	each	182.40	1459.00	19.16	25	256.75	6418.75	19.16	..do..
5.8	Making connection of drain or sewer line with existing manhole including breaking into and making good the walls, floors with cement concrete 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) cement plastered on both sides with cement mortar 1:3 (1 cement : 3 coarse sand) finished with a floating coat of neat cement and making necessary channels for the drain etc. complete :					19.21					
5.8.1	For pipes 100 to 230 mm diameter	1	each	164.30	164.00	19.21.1	1	275	275	19.21.1	
5.9	Providing sand cast iron drop connection externally for 60 cm drop from branch sewer line to main sewer manhole including inspection and cleaning eye with chain and lid, sand cast iron drop pipe and bend encased all-round with cement concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) with all centring and shuttering required, cutting holes in walls and making good with brick work in cement mortar 1:4 (1 cement : 4 coarse sand) plastered with cement mortar 1:3 (1 cement : 3 coarse sand) on inside of the manhole wall lead caulked joints between sand cast iron pipes and fittings, stiff cement mortar 1:1 (1 cement : 1 fine sand) joints between sand cast iron tee and S.W. pipe, making required channels complete as per standard design and specifications :					19.22					
5.9.1	150 mm dia. sand cast iron drop connection	1	each	5152.95	5152.95	19.22.2	1	6775.45	6775.45	19.22.2	

		Original P.E.					Revised P.E.				
SLNo	Description	Qty	Unit	Rate	Amount	DSR 2007	Qty	Rate	Amount	DSR 2012	Remarks
5.1	Providing and fixing S.W. intercepting trap in manholes with stiff mixture of cement mortar 1:1 (1 cement : 1 fine sand) including testing of joints etc. complete :					19.34					
5.10.1	150 mm dia	1	each	281.55	282.00	19.34.2	1	337.7	337.7	19.34.2	
5.11	Providing and laying cement concrete 1:5:10 (1 cement : 5 coarse sand : 10 graded stone aggregate 40 mm nominal size) all-round S.W. pipes including bed concrete as per standard design :										Item proposed as per agreement item . Item not included in PE
5.11.1	100 mm diameter S.W. pipe	0	metre			19.2.1	18	496.9	8944.2	19.2.1	
5.11.2	150 mm diameter S.W. pipe	0	metre			19.2.2	18	607.7	10938.6	19.2.2	
	Sub-Total				**128350.95**				**389719.1**		
	Total DSR Items				**878069.25**				**1227893.2**		
	Non Schedule Items										
	Water Supply										
1	Providing & fixing chicrinate Polyvinyl Chloride (CPVC) Pipes having thermal stability for hot & cold water supply including all CPVC plain & brass threaded fittings including fixing the pipe with clamps at 1.00 m spacing. This includes jointing of pipes & fittings with one step CPVC solvent cement and testing of joints complete as per direction of Engineer-in-charge (internal work exposed on wall)										
	65mm dia nominal bore	500	metre	1000	500000		500	1490	745000	Non DSR Items	

SLNo	Description	Original P.E. Qty	Unit	Rate	Amount	DSR 2007	Revised P.E. Qty	Rate	Amount	DSR 2012	Remarks
2	Providing & fixing chicrinate Polyvinyl Chloride (CPVC) Pipes having thermal stability for hot & cold water supply including all CPVC plain & brass threaded fittings including fixing the pipe with ciamps at 1.00 m spacing. This includes jointing of pipes & fittings with one step CPVC solvent cement & the cost of cutting chases and making good the same including testing of jointscomplete as per direction of Engineer-in-Charge (concealed) work including cutting chases and making good the walls etc)				0				0		
	40mm dia nominal bore	50	metre	400	20000		50	596	29800	do	
3	Painting GI/CPVC pipes & fittings with synthetic enamel white paint over a ready mixed priming coat both of approved quality for new work.				0				0		
	65mm nominal outer dia pipes.	500	metre	14	7000		500	21	10500	do	
	Total Cost for Sanitary Plumbing works (NDSR items)				**527000.00**				**785300.00**		
	TOTAL COST FOR SANITARY PLUMBING WORKS (DSR ITEMS + NDSR ITEM)				**1405536.00**				**2013193.20**		

Assistant Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

भारत सरकार
कार्यालय अधीक्षण अभियंता
भोपाल केन्द्रीय परिमण्डल, कें. लो. नि. वि.
'निर्माण सदन',52–ए, अरेरा हिल्स, भोपाल–462011

पत्र क्रं. 23(175)/BCC/2012-13/132-हि भोपाल/दिनांक 23/01/2013

प्रति,

मुख्य अभियंता(मं.अ),
के.लो.नि.वि. भोपाल,

विषय :— **Construction of Road Network (Phase-II) including SWD,external W/S drainage, rain water harvesting , NP2 pipe for HT,LT cable &DWC for street Light & OFC at PDPM IIITDM, Jabalpur**

****

महोदय

परियोजना मंण्डल कार्यपालक अभियंता जबलपुर से उपरोक्त विषयांकित कार्य के लिए प्रारम्भिक सह विस्तृत प्राक्कलन राशि रू. 18,41,24,400/- मय कन्टीनजेन्सी के लिए प्राप्त हुआ है । प्राक्कलन अग्रिम कारवाई हेतु प्रेषित है ।

संलग्न :— प्रारम्भिक सह विस्तृत प्राक्कलन

कार्यपालक अभियंता(योजना)
भोपाल केन्द्रीय परिमण्डल,
कें. लो. नि. वि. भोपाल

C/C

सत्यमेव जयते

GOVERNMENT OF INDIA

CENTRAL PUBLIC WORKS DEPARTMENT

STATE: Madhya Pradesh **CIRCLE:** Bhopal Central Circle **BRANCH:** B&R

DIVISION: Jabalpur Project Division

ESTIMATE No. /SE/BCC/12-13

NAME OF WORK: **Construction of Road Network(Phase-II) including SWD, external W/S drainage, rain water harvesting, NP2 pipe for HT,LT cable & DWC for street light & OFC at PDPM IIITDM, Jabalpur.**

FUND:

Major Head	Minor Head	Detailed Head

The Detailed estimate has been prepared by Er. R.K.Chaudhary, Executive Engineer, Jabalpur Project Division, CPWD, Jabalpur and further processed by Er. R.K. Gupta Executive Engineer (P), Bhopal Central Circle, CPWD, Bhopal of the probable cot of Rs. **18,41,24,400/-** including 3% contingencies.

// REPORT //

HISTORY :- This Detailed estimate amounting to **Rs.18,41,24,400/-** including 3% contingencies has been framed to cover the probable cost of above mentioned work to accord Administrative Approval and Expenditure Sanction of competent authority.

DESIGN & SCOPE :- The estimate has been framed based on the following drawings.

S. No.	Drawing Title	Drawing No.
1	Details of drawing for Road Networks- For remaining selected roads of campus	IIITDM/RD-ZONE ALL
2	Details of drawing for sewerage Networks- on remaining selected roads of campus	IIITDM/SN-ZONE ALL
3	Details of drawing for water line Networks- on remaining selected roads of campus	IIITDM/WN-ZONE ALL
4	Details of drawing for Storm water drain line Networks- on remaining selected roads of campus	IIITDM/SWD-ZONE ALL
5	Details of drawing for Electrical Networks- on remaining selected roads of campus.	IIITDM/ELECT-ZONE ALL
6	Details of drawing for Recyling water Networks- on remaining selected roads of campus.	IIITDM/RCWL-ZONE ALL
7	Typical plan & cross sections of 12 Mt Wide Road	CS RD-12
8	Typical plan & cross section of 09 MT wide road	CS RD-09
9	Typical plan & cross section of 09 MT wide RCC road	CS RCC RD-09
10	Typical plan & cross section of 7.5 MT wide road	CS RD-7.5
11	Typical plan & cross section of 7.5 MT wide RCC road	CS RCC RD-7.5
12	Longitudinal Section of Road -06	LS RD-06
13	Longitudinal Section of Road -07	LS RD-07
14	Longitudinal Section of Road -08	LS RD-08

15	**Longitudinal Section of Road -09**	**LS RD-09**
16	**Longitudinal Section of Road -17**	**LS RD-17**
17	**Longitudinal Section of Road -10**	**LS RD-10**
18	**Longitudinal Section of Road -11, 11P**	**LS RD-11**
19	**Longitudinal Section of Road -12**	**LS RD-12**
20	**Longitudinal Section of Road -13**	**LS RD-13**
21	**Longitudinal Section of Road -14**	**LS RD-14**
22	**Longitudinal Section of Road -20**	**LS RD-20**
23	**Longitudinal Section of Road -32**	**LS RD-32**
24	**Longitudinal Section of Road -33**	**LS RD-33**
25	**Longitudinal Section of Road -34**	**LS RD-34**
26	**Longitudinal Section of Road -35**	**LS RD-35**
27	**Longitudinal Section of Road -36**	**LS RD-36**
28	**Longitudinal Section of Road -37**	**LS RD-37**

The estimate includes the construction of Road no .6,7,8,9,17 in Zone 'B' & Road No. 10,11,12,13,14,20 in Zone 'C' & 32,33,34,35,37 (Central zone) & storm water drainage.

Specifications: The work shall be carried out as per CPWD specification 2009 Vol I to II with upto date correction slips.

Brief specifications of road

(A) For bituminous road

(i) Preparation of sub grade for filling section
(ii) 200mm thick Granular sub layere
(iii) 200mm thick bituminous mecadam
(iv) 40mm thick bituminous macadam
(v) 40mm thick bituminous concrete

(B) Concrete road considered in road no.32,33,34,35,36,37 for which the following items has been considered.

(i) Preparation of sub grade for filling section
(ii) 200mm thick Granular sub layer
(iii) 200mm thick wet mix macadam
(iv) 100mm thick C.C. 1:4:8
(v) 150mm thick M30 grade concrete with vacuum dewatering & finally finished by floating brooming

(C) For rain water harvesting

(i) Under ground brick masonry desilting chamber.
(ii) Brick masonry percolating well with bore well.

(D) Sewerage

(i) Different dia RCC NP2 class pipe has been used with chamber

(E) Storm water drainage

(i) Gully chamber to collect the storm water from road surface.
(ii) Different dia NP2 class RCC pipe disposed to desilting chamber.
(iii) Double Walled Corrugated(DWC) HDPE pipes are used for electrical cabling work.
(iv) To cross the road at different pipes the RCC duct has been provided.
(v) For water supply the ductile iron K 9 pipe used.
(vi) Road side furniture & signage dust bin has been provided on footpaths.

(vii) Recycled water line of PE-100 HDPE has been provided.
(viii) 80mm thick rubber moulded reflecting paver block has been provided on footpath portion.

Rate : Delhi Schedule of Rates 2012 & Market rates.
Cost : **Rs. Rs.18,41,24,400/-** including 3% contingencies.

Land : available with client.

W.C. Estt : Shall be met out of contingencies.

T&P : No special T&P is required.

Method : By contract after call of tender.

Time : 12 months(3 months for tender processing & 9 months for execution) after received of A/A & E/S

Assistant Engineer (P)
Bhopal Central Circle,
CPWD, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
CPWD, Bhopal

ANNEXURE-'A'

Modification made in lay out plan as **per observations of CE(CZ)/Bhopal**

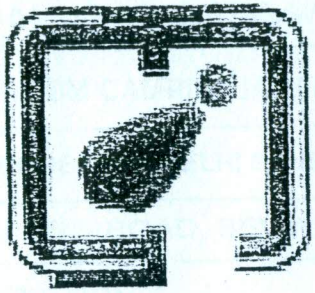
S.NO.	OBSERVATIONS	COMPLIANCE	REMARKS
1.	Why we are taking this S.W.D. parallel to nallah going up to A-5 before it is discharged ? Why just connect straight to nallah ?	**Wherever feasible the SW pipe connected straight to the nallah.**	Remark made on drawing no.- IIITDM/SWD & WP LAYOUT PLAN-03
2.	Road D 1-D 2 Why drainage line needed ? what is catchment for this line?	**Drainage line connected directly in the nallah at suitable interval.**	
3.	Road A10 Why drainage line away from nallah?	**Shifted towards nallah.**	
4.	For water supply – (A) Create another lay out map not mix up with SWD. (B) Water supply system shall be in defined closed grid with computer design for supply in main branch line with residual pressure at the top floor not less than 3m	**(A)Separate map has been prepared for water supply & drainage line.** **(B) Wherever feasible close grid created for water supply line.**	
5.	For SWD- (A) Basic principle- SWD System easy to clean (B)Keep it in conformity with NBC (C) Keep Distance to natural drainage as minimum.	**(A) Closed underground SWD adopted with manhole at suitable interval.** **(C) SWD layout has been kept towards the nallah.**	
6.	Adopt 40mm BM+40mm BC Compacted layer. Throughout as top surface are only wearing course. Such heavy traffic is not anticipated in future.	Modified as suggested	Remark made on drawing no.- IIIT/GEN/03 Typical road cross sections (12 & 9m Wide road
7.	Keep 50cm both site paved conc. Surface for drainage longitudinally leading to catch pit at calculated interval	**Modified as suggested**	
8.	Also paver cannot compact up to kerb stones so better leave space after paver has done its job	**Modified as suggested**	
9.	Poles should be in green . Footpath should be free from any obstruction.	**Modified as suggested**	
10	Keep 40mm BC in phase 2.	**For estimate purpose 40mm BC considered and after getting sanction necessary modification will be made in DE/TS.**	
11.	In phase I only 2.5cm thick carpat BM+DAC as per DSR 12 in phase 2	**In estimate final layer i.e. 40mmBM + 40BC considered for A/A & E/S purpose. However in T.C. same will be modified as suggested.**	Remark made on drawing no. INT RD 1 W02 cross sections of road

12.	Drg. In correct, catch pit can not have sub base.	Drawing has now been corrected.	
13.	Ensure cross ducts as regular interval for crossing cables , ducts W/S lines, etc. without having to cut road surface	Modified as suggested.	
14.	Make road cross section simple. If possible there should be well identified channel for carrying ducts cables etc. it should be in green zone only .	RCC channel provided at suitable interval for carrying ducts.	
15.	For Electrical cabling 2 no. 150mm dia RCC pipe in green zone with chamber @ 40-50 meter apart .	Provision has been made as suggested.	
16.	Electric pole to be shifted away from footpath.	Modified as suggested.	
17.	200+200mm thick layer of compacted granual sub base & compacted wet mix is sufficient instead of 200+250mm as show in drg.	Modified as suggested.	
18.	Catch pit should be only at regular defined interval.	Modified as suggested.	Remark made on drawing no.-INT-RD 1-W01 cross sections of road
19.	Wherever possible SW drain should be existed to natural drainage at the earliest.	Modified as suggested.	
20.	Telecom, TV cable pipes should be taken preferably in duct laid in green zone.	Modified as suggested.	
21.	Study carefully as to who would be using this circular road network. Joining lecture block, computer center design studio, I-II core labs. if cars are moving then 7.5m width may prone to be less.	Width of road changed to 12m/9m road as suggested.	Remark made on drawing no.- IIITDM/RD-LY-0 1
22.	People coming to auditorium from Narmada residency + others will be using this road keep it 12m wide. Also this road join 12m +18m. So keeping it 9m is not good.	Modified to same width of road 12m as suggested.	
23.	Not a well thought take off point. Why not from A-3 For Admin block it will be then left turn + right turn from A-3.	Mild Circular junction adopted.	
24.	If it is sewerage then why from in front of director bungalow? Why not from behind using lower contours?	Layout of sewerage line modified near Director Bunglow.	Remark made on drawing no.- IIITDM/RD-LAYOUT PLAN-0 2
25.	(A) Ensure W/S grid is kept at sufficient distance from sewerage system as per NBC. (b) Ensure W/S grid is kept above sewerage grid when it crosses (c) No. kink in sewerage grid. (d) change in direction only though manhole.	Modified as suggested.	
26	70mm thick bituminous concrete as shown in road section should be reduced to 50mm thick as there is low traffic density roads inside the campus, BM & DAC work should be shifted to phase II. In phase I premix carpet over WMM should be taken	Thickness of BC changed as suggested (for A/A & E/S purpose BM & BC considered)	Additional observation made in Inspection note issued vide No.

27	Storm water drainage should be designed in combined system ie. Partly is closed conduits in academic zone and open in other areas where natural slope of ground is comparatively steeper. Storm water drain shall be each that it is easy to clean at regular interval	For estimate point of view closed drainage has been considered. The same may be partially converted into open drain during detailed estimate/ during execution of work.	23(303)/EE/BCD-II/2012/993 dated 09-05-12.
28	The effluent of storm water drain should be connected to the nearest outfall rather than carrying it to long distance along the nallah as shown in the drawing.	Modified as suggested.	
29	Separate ducts for electrical conduits telephone lines, internal lines may be laid in the green zone duly marked for easy maintenance with X-ducts at regular interval to pas from one side to other side of road.	Modified as suggested.	

Assistant Engineer (P)
Bhopal Central Circle,
CPWD, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
CPWD, Bhopal



WORK NO. --	INFRA - 01

TOTAL ESTIMATE (BOQ)

CLIENT: PDPM INDIAN INSTITUTE OF INFORMATION TECHNOLOGY DESIGN AND MANUFACTURING, DUMNA AIR PORT ROAD, P.O. KHAMARIYA, JABALPUR-482005

ARCHITECTS : DATTA AND DATTA ASSOCIATES, 101 SNEH SHILP, 66,SWASTIK SOCIETY, NAVRANGPURA, AHMEDABAD - 380009

Phone: +917926407248, 26462618 Fax: +91792 6401242

PROJECT: DEVELOPMENT OF PDPM IIIT DM CAMPUS JABALPUR -- INFRASTRUCTURE DEVLOPMENT

TOTAL ESTIMATE (BOQ) -- FOR

ALL INFRASTRUCTURE CIVIL WORKS

184124400.00

BASED ON GOVERNMENT OF DELHI SCHEDULE OF RATES -- 2012

CLIENT: PDPM INDIAN INSTITUTE OF INFORMATION TECHNOLOGY DESIGN AND MANUFACTURING, DUMNA AIR PORT ROAD, P.O. KHAMARIYA, JABALPUR-482005

ARCHITECTS : DATTA AND DATTA ASSOCIATES, 101 SNEH SHILP, 66,SWASTIK SOCIETY, NAVRANGPURA AHMEDABAD-380009

PROJECT: DEVELOPMENT OF PDPM IIIT DM CAMPUS JABALPUR --- INFRASTRUCTURE DEVLOPMENT

BASED ON GOVERNMENT OF DELHI SCHEDULE OF RATES -- 2012

ABSTRACT - BOQ — REMAINING SELECTED ROADS OF CAMPUS - ROAD, SEWARAGE, WATER, SWD & CABLE DUCTING WORKS --

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		EARTH WORK				
1	2.3	Earth work in excavation by mechanical means (Hydraulic excavator) / manual means over areas (exceeding 30 cm in depth, 1.5 mt in width as well as 10 sqm on plan) including disposal of excavated earth, lead upto 50 m and lift upto 1.5 mt, disposed earth to be leveled and neatly dressed.	cum	17110.00	129.35	2213179.00
2	2.3	Banking excavated earth in layers not exceeding 20 cm. in depth, breaking clods, watering, rolling each layer with ½ tonne roller, or wooden or steel rammers, and rolling every 3rd and top-most layer with power roller of minimum 8 tonnes and dressing up, in embankments for roads, flood banks, marginal banks, and guide banks etc., lead upto 50 m and lift upto 1.5 m -- All kinds of soil	cum	18100.00	181.25	3280625.00
3	2.6	Earth work in excavation by mechanical means (Hydraulic excavator) / manual means in foundation trenches or drains (not exceeding 1.5 m in width or 10 sqm on plan) including dressing of sides and ramming of bottoms, lift upto 1.5 m, including getting out the excavated soil and disposal of surplus excavated soil as directed, within a lead of 50 m.				
	2.6.1	All kinds of soil.	Cum	6521.00	130.80	852947.00
4	2.8	Excavation work by mechanical means (Hydraulic excavator)/ manual means in foundation trenches or drains not exceeding 1.5m in width or 10 sqm on plan including dressing of sides and ramming of bottoms, lift upto 1.5 m, including getting out the excavated soil and disposal of surplus excavated soils as directed, within a lead of 50 m.				
5	2.8.1	Ordinary rock	cum	772.00	212.00	163664.00

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	2 3 3	Hard rock (blasting prohibited)	cum	415.00	491.90	204139.00
5	2 2	Extra for every additional lift of 1.5 m or part thereof in excavation /banking excavated or stacked materials.				
a	2 3 1	All kinds of soil.	Cum	1513.00	34.60	52350.00
b	2 3 2	Ordinary or hard rock.	cum	169.00	62.00	10478.00
6	2 1	Excavating trenches of required width for pipes, cables, etc including excavation for sockets, and dressing of sides, ramming of bottoms, depth upto 1.5 m including getting out the excavated soil and then returning the soil as required, in layers not exceeding 20 cm in depth including consolidating each deposited layer by ramming, watering, etc. and disposing of surplus excavated soil as directed, within a lead of 50 m :				
	2 1 1	All kinds of soil				
a	2 1 1 1	Pipes, cables etc, not exceeding 80 mm dia.	metre	1682.00	101.40	170555.0(
b	2 1 1 2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	25162.00	165.60	4166827.0
c	2 1 1 3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600 mm.	metre	208.00	258.55	53778.0
7	2 1	Extra for excavating trenches for pipes, cables etc. in all kinds of soil for depth exceeding 1.5 m but not exceeding 3 m. (Rate is over corresponding basic item for depth upto 1.5 metre				
a		Pipes, cables etc, not exceeding 80 mm dia.	metre	14.00	136.89	1916.0
b		Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	6664.00	223.56	1489804.0
c		Pipes, cables etc. exceeding 300 mm dia but not exceeding 600 mm.	metre	72.00	349.04	25131.0
8	2 1	Excavating trenches of required width for pipes, cables, etc, including excavation for sockets, depth upto 1.5 m including getting out the excavated materials, returning the soil as required in layers not exceeding 20 cm in depth, including consolidating each deposited layers by ramming, watering etc., stacking serviceable material for measurements and disposal of unserviceable material as directed, within a lead of 50m :				
	2 1	Ordinary rock				

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
a	2.13.1.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	199.00	**142.95**	28447.00
b	2.13.1.2	Pipes, cables etc. exceeding 80 mm dia but not exceeding 300 mm dia.	metre	3022.00	**353.95**	1069637.00
c	2.13.1.3	Pipes, cables exceeding 300 mm dia but not exceeding 600mm dia	metre	24.00	**407.30**	9775.00
9	2.13.3	Hard rock (blasting prohibited)				
a	2.13.3.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	98.00	**276.05**	27053.00
b	2.13.3.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	2025.00	**683.50**	1384088.00
c	2.13.3.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	16.00	**786.50**	12584.00
10	2.14	Extra for excavating trenches for pipes, cables, etc. in ordinary/hard rock exceeding 1.5 m in depth but not exceeding 3 m. (Rate is over corresponding basic item for depth upto 1.5 metre.				
	2.14.1	Ordinary rock :				
a	2.14.1.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	11.00	**150.10**	1651.00
b	2.14.1.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	650.00	**371.65**	241571.00
c	2.14.1.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	16.00	**427.67**	6843.00
11	2.14.2	Hard rock (blasting prohibited)				
a	2.14.2.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	11.00	**289.85**	3188.00
b	2.14.2.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	325.00	**717.68**	233244.00
c	2.14.2.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	8.00	**825.83**	6607.00
12	2.25	Filling available excavated earth (excluding rock) in trenches, plinth, sides of foundations etc. in layers not exceeding 20cm in depth, consolidating each deposited layer by ramming and watering, lead up to 50 m and lift upto 1.5 m.	Cum	2024.00	**83.80**	169611.0

ITEM No.	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNT
13	[illegible]	Sanding and filling in plinth with River sand / Murom under floors, including watering, ramming, consolidating and dressing complete.	cum	1150.00	**749.30**	861695.00
14	[illegible]	Carriage of materials by mechanical transport including loading, unloading and stacking.				
		Earth				
a		For a lead upto 1 Km.	Cum.	3086.00	**82.78**	255459.00
b		For a lead upto 2 Km.	Cum.	1908.00	**93.94**	179238.00
c		For a lead upto 3 Km.	Cum.	375.00	**104.98**	39368.00
d		For a lead upto 4 Km.	Cum.	379.00	**115.60**	43812.00
e		For a lead upto 5 Km.	Cum.	334.00	**125.92**	42057.00
f		Beyond 5 Kms. and upto 10 Kms. (Add for every 1 Km.)	Cum.	358.00	**9.22**	3301.00
		P.C.C. WORK				
15	[illegible]	Providing and laying in position cement concrete of specified grade excluding the cost of centering and shuttering - All work up to plinth level :				
a	[illegible]	1:4:8 (1 Cement : 4 coarse sand : 8 graded stone aggregate 40 mm nominal size).	cum	2726.00	**3593.30**	9795336.00
b	[illegible]	Providing and laying in position cement concrete of specified grade excluding the cost of centering and shuttering - All work up to plinth level :				
	[illegible]	1:5:10 (1 Cement : 5 coarse sand : 10 graded stone aggregate 40 mm nominal size).	cum	1699.00	**3357.40**	5704223.00
		R.C.C. WORK				

ITEM NO.	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
16	6.01	Providing and laying in position machine batched and machine mixed design mix M-25 grade cement concrete for reinforced cement concrete work, using cement content as per approved design mix, including pumping of concrete to site of laying but excluding the cost of centering, shuttering, finishing and reinforcement, including admixtures in recommended proportions as per IS: 9103 to accelerate, retard setting of concrete, improve workability without impairing strength and durability as per direction of Engineer-in-charge.				
	6.01.1	All works upto plinth level.	cum	148.00	**5242.15**	775838.00
17	6.6	Centering and shuttering including strutting, propping etc. and removal of form for :				
	6.6.6	Slab beams, Walls girders, bressumers and cantilevers.	sqm	1746.00	**262.25**	457889.00
18	6.22	Steel reinforcement for R.C.C. work including straightening, cutting, bending, placing in position and binding all complete upto plinth level.				
	6.22.6	Thermo-Mechanically Treated Bars.	kg	14800.00	**62.25**	921300.00
		BRICK WORK				
19	6.34	Brick work with non modular fly ash lime bricks (FALG Bricks) conforming to IS:12894-2002, class designation 10 average compressive strength in super structure above plinth level up to floor V level in :				
	6.34.2	Cement mortar 1:6 (1 cement : 6 Coarse sand)	cum	92.00	**3978.50**	366022.00
		FINISHING				
20	13.7	12 mm cement plaster finisned with a floating coat of neat cement of mix :				
	13.7.2	1:4 (1 cement: 4 fine sand)	sqm	700.00	**153.45**	107415.00
21	13.16	8 mm cement plaster of mix :				
	13.16.1	1:3 (1 cement: 3 fine sand)	sqm	1481.00	**101.00**	149581.00
		ROAD WORK				
		Granular Sub-base as per Table:- 400-1				
22	7.1	Preparation and consolidation of sub grade with power road roller of 8 to 12 tonne capacity after excavating earth to an average of 22.5 cm. depth, dressing to camber and consolidating with road roller including making good the undulations etc. and re-rolling the sub grade and disposal of surplus earth with lead upto 50 metres.	sqm	9960.00	**61.25**	610050.00

ITEM NO	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
23	16.75	Construction of granular sub-base by providing close graded Material conforming to specifications, mixing in a mechanical mix plant at OMC, carriage of mixed material by tippers to work site, for all leads & lifts, spreading in uniform layers of specified thickness with motor grader on prepared surface and compacting with vibratory power roller to achieve the desired density, complete as per specifications and directions of Engineer-in-Charge.				
	16.75.2	With material conforming to Grade-II (size range 53 mm to 0.075mm) having CBR Value-25	cum	6622.00	**1990.65**	13182084.00
24	16.79	Providing, laying, spreading and compacting graded stone aggregate (size range 53 mm to 0.075 mm) to wet mix macadam (WMM) specification including premixing the material with water at OMC in mechanical mix plant, carriage of mixed material by tipper to site, for all leads & lifts, laying in uniform layers with mechanical paver finisher in sub- base / base course on well prepared surface and compacting with vibratory roller of 8 to 10 tonne capacity to achieve the desired density, complete as per specifications and directions of Engineer-in-Charge.	cum	6622.00	**1960.60**	12983093.00
25	16.80	Providing and applying tack coat using hot straight run bitumen of grade VG - 10 including heating the bitumen, spraying the bitumen with mechanically operated spray unit fitted on bitumen boiler, cleaning and preparing the existing road surface as per specifications :				
	16.80.1	On W.B.M. @ 0.75 Kg / sqm.	sqm	25664.00	**40.15**	1030410.00
2	16.80.2	On bituminous surface @ 0.50 Kg / sqm.	sqm	25664.00	**29.00**	744256.00
26	16.85	Providing and laying bituminous macadam using crushed stone aggregates of specified grading premixed with bituminous binder, transported to site by tippers, laid over a previously prepared surface with paver finisher equiped with electronic sensor to the required grade, level and alignment and rolling with smooth wheeled, vibratory and tandem rollers as per specifications to achieve the desired compaction and density, complete as per specificatons and directions of Engineer-in-Charge.				
3	16.85.2	50 to 100 mm average compacted thickness with bitumen of grade VG-30 @ 3.50 % (percentage by weight of total mix) prepared in Batch Type Hot Mix Plant of 60-90 TPH capacity	cum	1026.00	**6149.90**	6309797.00

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
28	16.67	Providing and laying Bituminous concrete using crushed stone aggregates of specified grading, premixed with bituminous binder and filler, transporting the hot mix to work site by tippers, laying with paver finisher equiped with electronic sensor to the required grade, level and alignment and rolling with smooth wheeled, vibratory and tandem rollers to achieve the desired compaction and density as per specification, complete and as per directions of Engineer-in-Charge.				
	16.67.6	40-50 mm compacted thickness with bitumen of grade VG-30 @5.5% (percentage by weight of total mix) and lime filler @ 3% (percentage by weight of Aggregate) prepared in drum Type Hot Mix Plant of 60-90 TPH capacity.	cum	1026.00	**8836.20**	9065941.00
29	16.75 modified	Providing and laying C.C. pavement of mix M-30 with ready mixed concrete from batching plant. The ready mixed concrete shall be laid and finished with screed board vibrator, vacuum dewatering process and finally finished by floating, brooming with wire brush etc. complete as per specifications and directions of Engineer-in-charge. (The panel shuttering work shall be paid for separately).				
		NOTE -- Cement content considered in M-30 is @ 340 kg/cum. Excess/ less cement used as per design mix is payable/ recoverable separately.	cum	990.00	**6125.10**	6063849.00
29	16.46	Providing and fixing in position pre-moulded joint filler in expansion joints.	Per cm depth per cm width per m length			
				22000.00	**2.40**	52800.00
30	16.88	Providing and laying at or near ground level factory made kerb stone of M-25 grade cement concrete in position to the required line, level and curvature, jointed with cement mortar 1:3 (1 cement: 3 coarse sand) including making joints with or without grooves (thickness of joints except at sharp curve shall not to more than 5mm), including making drainage opening wherever required complete etc. as per direction of Engineer-in-charge (length of finished kerb edging shall be measured for payment). (Precast C.C. kerb stone shall be approved by Engineer-in-charge).	cum	1907.00	**5046.80**	9624248.00
31	16.86 modified	Providing and laying 80 mm thick factory made cement concrete interlocking paver block of M-30 grade made by block making machine with strong vibratory compaction, rubber moulded and reflective coating of approved size, design & shape, laid in required colour and pattern over and including 50mm thick compacted bed of fine sand, filling the joints with fine sand etc. all complete as per the direction of Engineer-in-charge.	sqm	9886.00	**914.15**	9037287.00

ITEM No.	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
32		Painting road surface marking with adequate no. of coats to give uniform finish with ready mixed road marking paint conforming to IS : 164, on bituminous surface in white/yellow shade including cleaning the surface of all dirt, scales, oil, grease and foreign material etc. complete.				
		New work (Two or more coats).	sqm	1588.00	**95.75**	152051.00
33		Providing Retro-reflective regulatory sign board of size 900mm dia meter made out of 2mm thick aluminum sheet, face to be fully covered with high intensity encapsulated lens type retro-reflective sheeting as approved by Engineer-in-charge . Letter, symbols, borders etc. shall be as per IRC - 67 with required color scheme on the boards and with the high intensity grade A. The aluminum sheet to be fixed to M.S. frame of sq. hollow sections of size 40 x 40 x 4mm. The boards will be fixed to 2 No. 50 x 50 mm square post made of M.S. hollow section 50 x 50 x 4 mm, 4m long welded to the frame with adequate anti-theft arrangement. Sheet work to be painted with two or more coats of synthetic enamel paint over an under coat primer and back side of aluminum sheet to be painted with two or more coats of epoxy paint including appropriate priming coat complete in all respects as per direction of Engineer-in-charge.	sqm	145.00	**5061.65**	733939.00
34		Providing @ 3 mm th Fiber glass or PVC @ 200 lit capacity Road site Dust- Bin of approved Shape and color. With Lead arrangement and supporting frame etc. as per detail drawings approved sample all complete and as directed by the Architect/ Engineer-in-Charge	each	51.00	**7500.00**	382500.00
35		Providing and fixing Bench in Cement Concrete (M-35) & req. reinforcement and with Terrazzo finish of overall size 2.1 m x 0.6 m x 0.4 m (height) including Concrete legs for contact with paving as per detail drawings, approved sample all complete and as directed by the Architect/ Engineer-in-Charge	each	51.00	**5500.00**	280500.00
		WATER SUPPLY				
36	NS	Providing and laying PE 100 class HDPE pipes conforming to IS:4984:1995 in all kinds of strata. This includes jointing of pipes & fittings, trenching ,refilling etc. complete as per direction of Engineer in Charge.				
		75 mm dia pipe (PN 12.5)	metre	10590.00	**874.00**	9255660.00

ITEM No.	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
37		Providing and laying PE 100 class HDPE pipes conforming to IS:4984:1995 in all kinds of strata. The rate includes jointing of pipes & fittings, making 5mm diaaholes at 30 cm c/c, trenching, refilling etc. complete as per direction of Engineer in Charge.				
	18 [illegible]	25 mm dia pipe (PN 12.5)	metre	9205.00	**118.00**	1086190.00
38	18 [illegible]	Providing and fixing half turn ball valve (brass) of approved quality etc complete :				
	18 73	25 mm nominal dia	each	420.00	**421.65**	177093.00
39		Making connection of HDPE distribution branch in HDPE main of following sizes by providing and fixing tee or coupler socket, including jointing the pipe etc. complete as per direction of Engineer in Charge:				
		110 x 110 x 25 mm	each	420.00	**250.00**	105000.00
40	18 [illegible]	Providing and laying S&S Centrifugally Cast (Spun) / Ductile Iron Pipes conforming to IS : 8329				
a	18 [illegible]	100 mm dia Ductile Iron Class K-9 pipes	meter	7096.00	**946.00**	6712816.0
b	18 [illegible]	150 mm dia Ductile Iron Class K-9 pipes	metre	10.00	**1389.40**	13894.0
c	18 [illegible]	200 mm dia Ductile Iron Class K-9 pipes	metre	10.00	**1895.40**	18954.0
41	18 73	Providing and laying Double Flanged (Screwed/ Welded) Centrifugally (Spun) Ductile Iron Pipes of Class K - 9 conforming to IS : 8329 :				
a	18 73 1	100 mm dia Ductile Iron Double Flanged	metre	72.00	**2376.45**	171104.0
b	18 73 2	150 mm dia Ductile Iron Double Flanged	metre	10.00	**3318.10**	33181.0
c	18 73 3	200 mm dia Ductile Iron Double Flanged	metre	10.00	**4395.00**	43950.0
42	18 [illegible]	Providing and laying D.I. specials of class K-12 suitable for push-on jointing as per IS : 9523				
	18 [illegible]	Upto 600 mm dia	quintal	68.71	**13958.95**	959119.0

ITEM NO	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
43		Providing and laying D Specials of Class K - 12 suitable for mechanical jointing as per IS : 8329				
		Up to 600 mm dia	quintal	14.04	**14760.35**	207235.00
44		Providing and fixing C.I. sluice valves (with cap) complete with bolts, nuts, rubber insertions etc. (the tail pieces if required will be paid separately) :				
a		100 mm diameter				
		Class I	each	201.00	**3498.30**	703158.00
b		150 mm diameter				
		Class	each	18.00	**5200.40**	93607.20
c		200 mm diameter				
		Class	each	18.00	**11260.60**	202691.00
45		Providing and fixing C.I. double acting air valve of approved quality with bolts, nuts, rubber insertions etc. complete (The tail pieces, tapers etc if required will be paid separately) :				
a		80 mm dia	metre	135.00	**4018.15**	542450.00
b		80 mm dia	metre	36.00	**5830.10**	209884.00
c		100 mm dia	metre	31.00	**7602.35**	235673.00
46		Providing and fixing enclosed type water meter (bulk type) conforming to IS : 2373 and tested by Municipal Board complete with bolts, nuts, rubber insertions etc. (The tail pieces if required will be paid separately) :				
		100 mm dia nominal bore	each	31.00	**4329.20**	134205.00
47		Providing and fixing G.I. pipes complete with G.I. fittings including trenching and refilling etc.				
		External work				
a		25 mm dia nominal bore	metre	198.00	**209.40**	41461.00

ITEM NO	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b		32 mm dia nominal bore	metre	14.00	**248.55**	3480.00
c	18 12 6	40 mm dia. nominal bore	metre	14.00	**294.20**	4119.00
d	18 12 8	50 mm dia. nominal bore	metre	1524.00	**355.95**	542468.00
e		65 mm dia. nominal bore	metre	9000.00	**453.55**	4081950.00
f	18 12 9	80 mm dia. nominal bore	metre	3.00	**573.40**	1720.00
48	18 13	Making connection of G.I. distribution branch with G.I. main of following sizes by providing and fixing tee, including cutting and threading the pipe etc. complete :				
a	18 13 1	25 to 40 mm nomina. bore	each	13.50	**277.35**	3744.00
b	18 13 2	50 to 80 mm nominal bore	each	135.00	**630.15**	85070.00
49	18 14	Fixing water meter and stop cock in G.I. pipe line including cutting and threading the pipe and making long screws etc. complete (cost of water meter and stop cock to be paid separately)	each	135.00	**228.55**	30854.00
50	18 17	Providing and fixing gun metal gate valve with C.I. wheel of approved quality (screwed end) :				
a	18 17 1	25 mm nominal bore	each	11.80	**372.95**	4401.00
b	18 17 2	32 mm nominal bore.	each	2.20	**450.90**	992.00
c	18 17 3	40 mm nominal bore	each	2.80	**546.05**	1529.00
d	18 17 4	50 mm nominal bore	each	135.00	**780.60**	105381.00
e	18 17 5	65 mm nominal bore	each	31.00	**1073.25**	33271.00
f	18 17 6	80 mm nominal bore	each	9.00	**1832.95**	16497.00

ITEM No.	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
51	19 33	Constructing masonry Chamber 60 x 60 x 75 cm inside, in brick work in cement mortar 1:4 (1 cement : 4 coarse sand) for sluice valve, with C.I. surface box 100mm. top diameter, 160 mm bottom diameter and 180 mm deep (inside) with chained lid and RCC top slab 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20mm nomina size) , i/c necessary excavation. foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) and inside plastering with cement mortar 1:3 (1 cement : 3 coarse sand) 12 mm thick finished with a floating coat of neat cement complete as per standard design :				
	19 33 1	i) In common burnt clay F.P.S.(non modular) bricks of class designation 7.5.	Each	135.00	**5392.90**	728042.00
52	19 34	Constructing masonry Chamber 90 x 90 x 100 cm inside, in brick work in cement mortar 1:4 (1 cement : 4 coarse sand) for sluice valve, with C.I. surface box 100 mm. top diameter, 160 mm bottom diameter and 180 mm deep (inside) with chained lid and RCC top slab 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size), i/c necessary excavation foundation concrete 1:5:10 (1 cement : 5 fine sand:10 graded stone aggregate 40 mm nominal size) and inside plastering with cement mortar 1:3 (1 cement : 3 coarse sand) 12 mm thick finished with a floating coat of neat cement complete as per standard design :				
	19 34 1	i) In common burnt clay F.P.S.(non modular) bricks of class designation 7.5.	each	201.00	**9277.10**	1864697.00
		DRAINAGE				
53	19 [illegible]	Constructing brick masonry manhole in cement mortar 1:4 (1 cement : 4 coarse sand) with R.C.C top slab with 1:2:4 mix (1 cement : 2coarse sand : 4 graded stone aggregate 20 mm nominal size), foundation concrete 1:4:8 mix (1 cement : 4 coarse sand : 8 graded stone aggregate 40mm nominal size), inside plastering 12mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished with floating coat of neat cement and making channels in cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm nominal size) finished with a floating coat of neat cement complete as per standard design :				
	19 [illegible] 2	Inside size 120x90 cm and 90 cm deep including C.I. cover with frame (medium duty) 500 mm internal diameter, total weight of cover and frame to be not less than 116 kg (weight of cover 58 kg and weight of frame 58 kg) :				
a	19 [illegible] 2	i) In common burnt clay F.P.S. (non modular) bricks of class designation 7.5	Each	833.00	**15322.95**	12764017.00

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b		Providing and fixing in position pre-cast R.C.C. manhole cover and frame of required shape and approved quality				
	19193	FD-20			1390.25	
	19193-1	Circular shape 560 mm internal diameter (Less Diffrence Of C.I.& RCC cover with frame)	each	833.00	-4290.64	-3574103.00
64	1964	Providing and laying non-pressure NP2 class (light duty) R.C.C. pipes with collars jointed with stiff mixture of cement mortar in the proportion of 1:2 (1 cement : 2 fine sand) including testing of joints etc. complete				
a	19641	150 mm	meter	32.00	254.50	8144.00
b	19643	250 mm	meter	14574.00	342.45	4990866.00
c	19644	300 mm	meter	8534.00	422.90	3609029.00
d	19645	450 mm	meter	120.00	620.85	74502.00
e	19647	600 mm	meter	120.00	1084.25	130110.00
c	1963	Extra for depth for manholes				
	19632	120 x 90 cm size manhole over item above.				
	19632-1	With common burnt clay F.P.S. (nor modular) bricks of class designation 7.5	Per meter	523.00	4866.75	2545310.00
d	19652	Providing M.S. foot rests including fixing in manholes with 20x20x10 cm cement concrete blocks (1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 20 mm nominal size) as per standard design :				
	19652-1	With 20 mm diameter round bar	Each	2778.00	193.15	536571.00
65	1964	Providing and fixing S.W. intercepting trap in manholes with stiff mixture of cement mortar (1 cement : 2 fine sand) including testing of joints etc. complete :				
	19641	150 mm dia	each	111.00	337.70	37485.00
66	1967	Constructing brick masonry road gully chamber 50 x 50 x 60 cm with bricks in cement mortar (1:4 (1 cement : 4 coarse sand) including 770 x 770 mm pre-cast R.C.C. horizontal grating with frame complete as per standard design :				

ITEM No.	DSR ITEM code	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
	19.27.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	Each	410.00	3193.5	1309335.00
57	19.30	Constructing brick masonry chamber for underground C.I. inspection chamber and bends with bricks in cement mortar 1:4 (1 cement : 4 coarse sand) C.I. cover with frame (light duty) 455x610 mm internal dimensions, total weight of cover with frame to be not less than 38 kg (weight of cover 23 kg and weight of frame 15 kg), R.C.C. top slab with 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size), inside plastering 12 mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished smooth with a floating coat of neat cement on walls and bed concrete etc. complete as per standard design				
a	19.30.1	Inside dimensions 455 x 610 mm and 45 cm deep for single pipe line:				
	19.30.1.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	each	768.00	**3917.65**	3008755.00
b	19.8	Providing and fixing in position pre-cast R.C.C. manhole cover and frame of required shape and approved quality				
	19.8.1	CD-2.5				
	19.8.1.1	Rectangular shape 600x450mm internal dimensions (Less Diffrence Of C.I.& RCC cover with frame	each	768.00	**-940.80**	-722534.00
c	19.31	Extra for depth beyond 45 cm of brick masonry chamber :				
	19.31.1	For 455 x 610 mm size				
	19.31.1.1	With F.P.S. bricks	metre	401.00	**2824.45**	1132604.00
58	19.21	Making connection of drain or sewer line with existing manhole including breaking into and making good the walls, floors with cement concrete 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) cement plastered on both sides with cement mortar 1:3 (1 cement : 3 coarse sand) finished with a floating coat of neat cement and making necessary channels for the drain etc. complete :				
	19.21.2	For pipes 250 to 300 mm diameter	Each	216.00	**333.15**	71960.0
		CENTRATING COLUMN WORK				

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
59		Providing and erecting steel ventilating columns 15 cms. dia. with C.I. ornamental cap and base fixed firmly with necessary foundation with one coat of red lead oxide paint and one coat of any approved colour with 15 cms, dia. stoneware or R.C.C. pipe connection with M.H. including excavation with M.H. including excavation and jointing as required etc. complete. (As per drawing)	No.	22.00	**16490.00**	362780.00
		FIRE FIGHTING SYSTEM				
60		Supplying & fixing 63 mm dia Gun metal branch pipe with 25 mm (nominal internal diameter) size Gun Metal nozzle conforming to IS 903, suitable for instantaneous connection to interconnect hose pipe coupling as required.	Nos	31.00	**1829.00**	56699.00
61		Providing and fixing following class-II Globe wheel valves, confirming to IS 778/1984 (Reaffirmed 2005), tested to 21.09 kg/sq.cmt.				
		Screwed				
		25mm dia	Nos	31.00	**252.00**	7812.00
62		Providing and fixing gunmetal Singel headed Yard hydrant valve conforming to IS - 5290 with 63 mm dia instantaneous female coupling on the outlet with S.S. orifice flange 6 mm thick as required to maintain 3.5 Kg/sq.cm., gunmetal blank cap and chain, necessary companion flanges (as per table "E") nuts, bolts, washer and gasket complete as per specification. (ISI marked)				
		Single outlet	Each	31.00	**4752.00**	147312.00
63		Supplying and fixing 63mm dia, 15 mtr. Long RRL hose pipe with 63mm dia Male and Female Gun metal couplings duly banded with GI wire, rivets etc. conforming to IS 636 (type-A) as required.	Nos	31.00	**2040.00**	63240.00
64		Supplying and Fixing Fire Hose Reel, wall mounting swinging type complete with drum & bracket of MS construction, spray painted in Post office Red, confirming to IS 884/1995 with upto date amendments, complete with the following as required.				
	a	36 Meter long 20 mm dia water hose Thermoplastic (Textile reinforced) Type - 2 as per IS : 12585				
	b	20 mm dia gun metal ball valve & nozzle.				
	c	Clips and brackets for fixing the equimpments on wall.				
	d	Connection from riser with stop valve (gun metal) & M.S. Pipe	Nos	31.00	**7260.00**	225060.00

ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
... Percolating Well with brick masonry Filter chamber for underground with part ... plastering in cement mortar 1:4 (1 cement : 4 coarse sand) and Hunney comb ... filter ... P.C.C. top slab with 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20 mm nominal size) foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) below masomary, inside part plastering 12 ... with cement mortar 1:3 (1 cement : 3 coarse sand) finished smooth with a floating ... of neat cement on walls and bed concrete etc. complete and Including Bore well of ... dia for casing / strainer pipe, by suitable method prescribed in IS: 2800 (part I), ... collecting samples from different strata, preparing and submitting strata chart/bore ... hire & running charges of all equipments, tools, plants & machineries required ... complete as per direction of Engineer-in-charge, upto 50 metre depth below ... as per standard designas and as per detail drawings all complete and as directed by the Architect/ Engineer-in-Charge.				
... @ 2.5 mt dia 3 deep filter Chamber. And 15 dia PVC Percolating Well of @ 50 ... Each	Each	12.00	140000.0	1680000.00
...CENT PLASTER WITH A FLOATING COAT OF NEAT CEMENT				
TOTAL COST OF ALL INFRA. - REMAINING SELECTED ROADS OF CAMPUS - ROAD, SEWARAGE, WATER, SWD & CABLE DUCTING WORKS --				168921477
Add for Quality Assurance@	1%			1689215.00
Add for Labour Cess@	1%			1689215.00
Add for VAT@	4%			6756859.00
Add Connegancy @	3%			5067644.00
G Total				184124410.20
Say				184124400.00

(Rupees Eighteen Crore Forty One Lacs Twenty Four Thousand Four Hundred Only)

...sst. Engineer(P...
Bhopal Central Circle,
...tral P.W.D., Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal

23.12.

Superintending Engineer
Bhopal Central Circle,
Central P.W.D., Bhopal

Add Architect-fee @ 4.5% + 12.36% Service Tax i.e. 5.056% on Rs. 168921477.00 = 8547427.00

14267182 7.00

Client: PDPM Indian Institute of Information Technology Design and Manufacturing, Dumna Air Port Road, P.O. Khamariya, Jabalpur-482005

Architect: Datta and Datta Associates, 101, Sneh Shilp, 66, Swastik Society, B/h St. Xaviars Ladies Hostel, Navrangpura, Ahmedabad.

PROJECT: CONSTRUCTION OF ROAD AND SERVICE NETWORKS PHASE-2 (ELECTRICAL WORKS) AT IIITDM, JABALPUR

SUMMARY FOR ELECTRICAL WORKS

SR.	PARTICULAR	AMOUNT	
1	ELECTRICAL WORKS (DSRT ITEMS)	Rs.	31,01,401.50
2	ELECTRICAL WORKS (NDSRT ITEMS)	Rs.	6,07,85,742.00
	TOTAL COST FOR ELECTRICAL WORKS	Rs.	6,38,87,143.50
	Add 5% FOR GRIHA RATING	5%	31,94,357.18
	Add 1% for Labour welfare cess	1%	6,38,871.44
	Add 3% for Contingencies	3%	19,16,614.31 323-136.60
	Add 5.618 % for Architects Fees	5.618%	~~35,89,179.72~~
	TOTAL AMOUNT		~~7,32,26,166.14~~ 728671 20.00

Say Rs 728.67 Lacs

Anirudh K Datta, Proprietor,
Datta And Datta Associates,
Ahmedabad

DATTA AND DATTA ASSOCIATES EST. 1982 AHMEDABAD

Annexure B&WC/2013/1/A-6

Client: PDPM Indian Institute of Information Technology Design and Manufacturing, Dumna Air Port Road, P.O. Khamariya, Jabalpur-482005

Architect: Datta and Datta Associates, 101, Sneh Shilp, 66, Swastik Society, B/h St. Xaviars Ladies Hostel,Navrangpura, Ahmedabad.

Project : Electrical Infrastructure Services for Phase-1

SUMMARY

PART A : ELECTRICAL WORKS (ITEMS AS PER DSR - 2012)

SR.	PARTICULAR		AMOUNT
1	HV / LV CABLE LAYING, CABLE TRENCH AND TRAY	Rs.	10,74,232.00
2	CABLE TERMINATION	Rs.	3,60,720.00
3	INTERNAL POINT WIRING	Rs.	3,50,411.50
4	EARTHING	Rs.	13,16,038.00
	ELECTRICAL WORKS (DSRT ITEMS)	Rs.	31,01,401.50

Client: PDPM Indian Institute of Information Technology Design and Manufacturing, Dumna Air Port Road, P.O. Khamariya, Jabalpur-482005

Architect: Datta and Datta Associates, 101, Sneh Shilp, 66, Swastik Society, B/h St. Xaviars Ladies Hostel,Navrangpura, Ahmedabad.

Project : Electrical Infrastructure Service for Phase - 1

ESTIMATE

PART: A ELECTRICAL WORKS (ITEMS AS PER DSR - 2012)

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		SECTION - 1.0 HV / LV CABLE LAYING, CABLE TRENCH AND TRAY				
		HV CABLE LAYING : WITH SAND AND PROTECTIVE COVERING				
		Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size direct in ground including excavation, sand cushioning, protective covering and refilling the trench etc as required.				
1.1	8.1.2	Above 120 sq. mm and upto 400 sq. mm	Mtr	25	245.00	6,125.00
		Laying of one number additional PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation, sand cushioning, protective covering and refilling the trench etc as				
1.2	8.2.2	Above 120 sq. mm and upto 400 sq. mm	Mtr	25	172.00	4,300.00
	8.30	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size in the existing RCC/ HUME/ METAL/DWC pipe as required.				
1.3	8.3.2	Above 120 sq. mm and upto 400 sq. mm	Mtr	4150	44.00	1,82,600.00
	8.40	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 11 KV grade of following size in the existing masonry open duct as required.				
1.4	8.4.2	Above 120 sq. mm and upto 400 sq. mm	Mtr	50	37.50	1,875.00
		LV/MV CABLE LAYING : WITH SAND AND PROTECTIVE COVERING				
1.5	7.10	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground including excavation, sand cushioning, protective covering and refilling the trench etc as required.				
1.5.1	7.1.1	Upto 35 sq. mm	Mtr	100	177.00	17,700.00
	7.1.3	Above 35 sq. mm and upto 400 sq. mm	Mtr	50	265.00	13,250.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
1.6	7.2	Laying of one number additional PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size direct in ground in the same trench in one tier horizontal formation including excavation, sand cushioning, protective covering and refilling the trench etc as required.				
1.6.1	7.2.1	Upto 35 sq. mm	Mtr	50	121.00	6,050.00
1.6.2	7.2.4	Above 185 sq. mm and upto 400 sq. mm	Mtr	100	149.00	14,900.00
1.7	7.5	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing RCC/ HUME/ METAL/DWC pipe as required.				
1.7.1	7.5.1	Upto 35 sq. mm	Mtr	4000	12.00	48,000.00
1.7.2	7.5.4	Above 185 sq. mm and upto 400 sq. mm	Mtr	6606	44.00	2,90,664.00
1.8	7.6	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing masonry open duct as required.				
1.8.1	7.6.1	Upto 35 sq. mm	Mtr	300	9.10	2,730.00
1.8.2	7.6.4	Above 185 sq. mm and upto 400 sq. mm	Mtr	200	37.50	7,500.00
1.9	7.7	Laying and fixing of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size on wall surface as required. (cable tray)				
1.9.1	7.7.1	Upto 35 sq. mm (clamped with 1mm thick saddle)	Mtr	60	19.50	1,170.00
1.9.2	7.7.4	Above 185 sq. mm and upto 400 sq. mm (clamped with 40x3mm MS flat clamp)	Mtr	222	95.00	21,090.00
1.10	4.1	Supplying and installing following size of perforated pre-painted M.S. cable trays with perforation not more than 17.5%, in convenient sections, joined with connectors, suspended from the ceiling with M.S. suspenders including bolts & nuts, painting suspenders etc as required.				
1.10.1	4.1.6	450 mm width x 50 mm depth x 2 mm thickness	Mtr	50	974.00	48,700.00
1.10.2	4.1.7	600 mm width x 50 mm depth x 2 mm thickness	Mtr	100	1,210.00	1,21,000.00
1.10.3	4.1.15	750 mm width x 75 mm depth x 2.0 mm thickness	Mtr	150	1,507.00	2,26,050.00
1.11	7.9	Supply and making cable route marker with cement concrete 1:2:4(1 cement : 2 corase sand : 4 graded stone aggregate 20 mm nominal size) of size 60 cm x 60 cm at the bottom and 50 cm x 50 cm at the top with thickness of 10 cm including inscription duly engraved as required.	Each	56	263.00	14,728.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
1.17		Supply and fixing cable route marker with 10 cm x 10 cm x 5 mm thick G I plate with inscription there on, bolted /welded to 35 mm x 35 mm x 6 mm angle iron, 60 cm long and fixing the same in ground as required	Each	200	244.00	48,800.00
		SUB TOTAL			**Rs.**	**10,74,232.00**
		SECTION - 2.0 CABLE TERMINATION				
	9.1	Supplying and making indoor end termination with brass compression gland and aluminium lugs for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.				
2.1	9.1.30	3½ X 300 sq. mm (70mm)	Each	168	867.00	1,45,656.00
2.2	9.1.21	3½ X 35 sq. mm (32mm)	Each	8	223.00	1,784.00
2.3	9.1.32	4 X 10 sq. mm (25mm)	Each	466	146.00	68,036.00
2.4	10.1	Supplying and making indoor cable end jointing with cast resin compound, including lugs and other jointing materials, for following size of 3 core, XLPE aluminium conductor cable of 11 KV grade as required .				
2.4.1	10.1.3	240 sq mm	Each	44	3,301.00	1,45,244.00
		SUB TOTAL			**Rs.**	**3,60,720.00**
		SECTION - 3.0 POINT WIRING				
		COPPER WIRING IN PVC CONDUIT				
3.1	1.10	Point wiring in PVC conduit, with modular type switch. Wiring for light point / fan point / exhaust fan point / call bell point with 1.5 sqmm FR PVC insulated copper conductor single core cable in surface / recessed PVC conduit, with modular switch, modular plate, suitable GI box and earthing the point with 1.5 sqmm FR PVC insulated copper conductor single core cable etc as required.				
3.1.1	1.10.3	Group C	Point	28	664.00	18,592.00
	1.11	Twin control point wiring in PVC conduit, with modular type switch : Wiring for twin control light point with 1.5 sq.mm FR PVC insulated copper conductor single core cable in surface / recessed PVC conduit, 2 way modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm FR PVC insulated copper conductor single core cable for loop earthing as required.	Point	7	710.00	4,970.00
		Power plug wiring in PVC conduit (2x4 sq.mm) : Wiring for light / power plug with 2x4 sqmm FR PVC insulated copper conductor single core cable in surface / recessed PVC conduit along with 1 no 4 sqmm FR PVC insulated copper conductor single core cable for loop earthing as required - only for 15 A sockets	Mtr	210	182.00	38,220.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
3.4	1.14	Circuit / sub-main wiring in PVC conduit : Wiring for circuit / submain wiring alongwith the following sizes of PVC insulated copper conductor, single core cable in surface / recessed PVC conduit as required.				
3.4.1	1.14.1	2 x 1.5 sq.mm + 1 x 1.5 sq. mm earth wire - FOR LOOPING OF 5A SOCKETS + Street light pole Junction box to fixtures	Mtr	2097	107.00	2,24,379.00
3.4.2	1.14.2	2 x 2.5 sq.mm + 1 x 2.5 sq. mm earth wire - FOR 5 AMP SOCKETS AND LIGHTING CKTS.	Mtr	210	131.00	27,510.00
3.5	1.21	S/F PVC Conduit : Supplying and fixing of following sizes of PVC conduit along with accessories in surface / recess including cutting the wall and making good the same in case of recessed conduit as required.				
3.5.1	1.21.2	25 mm	Mtr	150	64.50	9,675.00
3.5.2	1.21.3	32 mm	Mtr	200	80.50	16,100.00
3.6	1.31	S/F Power plug point modular type accessories : Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 3 pin 5/6 amps modular socket outlet and 5/6 amps modular switch, connection, painting etc. as required.	Each	14	288.00	4,032.00
3.7	1.32	S/F Power plug point modular type accessories : Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 6 pin 15/16 and 5/6 amps modular socket outlet and 15/16 amps modular switch, connection, painting etc. as required.	Each	14	366.00	5,124.00
3.8	1.25	Supply and fixing stepped type electronic fan regulator on the existing modular plate, switch box including connections but excluding modular plate etc as required	Each	7	322.00	2,254.00
3.9	1.44	Installation, Testing and commiossioning of ceiling fan, including wiring, the down rods of standard length (up to 30cm) with 1.5 sq mm FR PVC insulated, copper conductor, single core cable etc. as required	Each	7	73.50	514.50
3.10	1.50.1	Installation of Exhaust fan up to 450mm sweep in the existing opening, including making the hole to suit the size of the above fan, making good the damage, connection, testing, commissioning ets. as required.	Each	14	163.00	2,282.00
3.11	1.51	Extra for fixing the louvers / shutters complete with frame for a exhaust fan for all sizes	Each	14	68.50	959.00
		SUB TOTAL			Rs.	3,50,411.50
		SECTION -4.0 EARTHING				

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
4.1	5.6	Earthing with copper earth plate 600 mm X 600 mm X 3 mm thick including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe of 2.7 metre long etc. with charcoal/ coke and salt as required.	Set	42	8,559.00	3,59,478.00
4.2	5.10	Providing and fixing 25 mm X 5 mm copper strip in 40 mm dia G.I. pipe from earth electrode including connection with brass nut, bolt, spring, washer excavation and re-filling etc. as required.	Mtr	630	962.00	6,06,060.00
4.3	5.14	Providing and fixing 25 mm X 5 mm copper strip on surface or in recess for connections etc. as required.	Mtr	420	766.00	3,21,720.00
4.4	5.20	P/F 50mm X 5 mm copper earth bus on surface : Providing and fixing earth bus of 50mm X 5 mm copper strip on surface for connections etc, as required.	Mtr	20	1,439.00	28,780.00
		SUB TOTAL			**Rs.**	**13,16,038.00**
		TOTAL COST FOR ELECTRICAL WORKS (DSR ITEMS)				**31,01,401.50**

Client: PDPM Indian Institute of Information Technology Design and Manufacturing, Dumna Air Port Road, P.O. Khamariya, Jabalpur-482005

Architect: Datta and Datta Associates, 101, Sneh Shilp, 66, Swastik Society, B/h St. Xaviars Ladies Hostel,Navrangpura, Ahmedabad.

Project : Electrical Infrastructure Services for Phase - 1

SUMMARY

PART A : ELECTRICAL WORKS (NDSR ITEMS)

SR.	PARTICULAR		AMOUNT
1	ELECTRICAL ROOM EQUIPMENT & AUXILLARY	Rs.	1,97,666.00
2	SUB STATION AND ACCESSORIES	Rs.	2,54,10,504.00
3	ELECTRICAL PANELS INSTALLATION	Rs.	1,20,12,143.00
4	L.T. CABLES	Rs.	1,65,73,539.00
5	EXTERNAL ELECTRIFICATIONS	Rs.	65,91,390.00
	ELECTRICAL WORKS (NDSRT ITEMS)	Rs.	6,07,85,742.00

Client: PDPM Indian Institute of Information Technology Design and Manufacturing, Dumna Air Port Road, P.O. Khamariya, Jabalpur-482005

Architect: Datta and Datta Associates, 101, Sneh Shilp, 66, Swastik Society, B/h St. Xaviars Ladies Hostel,Navrangpura, Ahmedabad.

Project : Electrical Infrastructure services for Phase - 1

ESTIMATE

PART A : ELECTRICAL WORKS (NDSR ITEMS)

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		SECTION - 1.0 ELECTRICAL ROOM EQUIPMENT AND AUXILIARY				
1.1	MR	Supply and Fixing of 6.5kg Co2 type portable fire extinguisher	No	14	7,159.00	1,00,226.00
1.2	MR	Supply and fixing of first aid M S box with standard make and also contains all medical items.	No	7	546.00	3,822.00
1.3	MR	Supply and fixing Chart in glassed wooden frame.	No	7	206.00	1,442.00
1.4	MR	Supply and fixing of fire buckets with floor / wall mounting stand and first filling of sand	No	14	1,581.00	22,134.00
1.5	MR	Supply and fixing of 1 x 20 W FL T/L self contained emergency light with dry type maintenance free battery.	No	14	2,034.00	28,476.00
1.6	MR	Supply and fixing of 11 KV grade 12 mm thick 1000 mm wide rubber insulating mat	RMT	14	1,703.00	23,842.00
1.7	MR	Supply and fixing of 1.1 KV grade 6 mm thick 1000 mm wide rubber insulating mat	RMT	21	844.00	17,724.00
		SUB TOTAL				**1,97,666.00**
		SECTION - 2.0 SUB STATION AND ACCESSORIES				
2.1	MR	Supply, installation, Testing and commissioning of 1250 KVA Compact sub Station as per following Specifications : **HT Switchgear** Two way, 11kV, 21kA for 1 sec.Extinsible Compact switchgear (Type 2IS+1DC) consisting of 2nos. feeder with fixed manually operated 630A Load break switch and 1No. draw out type electrical and mecanical operated 630A Vacuum Circuit Breaker in SF6 insulated stainless steel enclosure along with below mentioned items. Interconnection between HT switchgear and transformer shall be using Al. unarmorured XLPE Cable.1 No of vacume or SF6 circuit breaker of 630A with intigral earth switch with self powered over current and earth fault relay, with shunt trip coil of 230V AC with push button for circuit breaker manual tripping, neon live cable indicators with SF6 gas pressure monitor.included SCADA intigrated system inbuilt in system. **Transformer** 1250KVA, 11KV/433V, DYn11, VPI (Vacuum Pressure Impregnated) OVDT (Open Ventilated Dry Type) transformer, with top bushings for HT & LT with off load tap switch of rating +5% to -5% @2.5% on HT side of transformer,with WTI as per Specifications.	No	7	32,28,108.00	2,25,96,756.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		LT panel 433V LT Indoor panel 2000A with Aluminium Busbars , Fabrication using 1.5/2 MM CRCA sheet steel, Ingress protection IP4X , complete with internal wiring consisting of following. **Incomer Cum Outgoing** 2nos 2000A, 4P, 50KA draw out type electrical and mechanical operated type Air Circuit Breaker with Micro Processor based Release protection release, all relay function included etc.S/C,E/F.O/L,S/T is in built. **Outdoor Enclosure** Outdoor type enclosure having modular construction of Galvanised Sheet Steel. The Enclosure shall have IP54 degree of protection for HT & LT switchgear compartment & IP23 degree of protection for Transformer compartment. The enclosure exterior shall be painted with polyurathene paint (colour Light Gray & D.A.Gray). Each compartment will be provided with the door and pad locking arrangement. The Compartment illumination lamp with door operated switch shall be provided for each compartment. **Interconnection & Earthing** Interconnection Between HT switchgear & Transformer using 1Cx185Sq.mm XLPE Single core cable & Interconnection between Transformer & LT switchgear using Busbars. Internal earthing connections by GI Strips.				
2.2	MR	Supply, Installation, Testing and Commissioning of 630A 11 KV HT VCB breaker with protection relay (OV & UV) in existing panel complete with all accessories etc. electrical and mecanical operated 630A Vacuum Circuit Breaker in SF6 insulated stainless steel enclosure along with below mentioned items.1 No of vacume or SF6 circuit breaker of 630A with intigral earth switch with self powered over current and earth fault relay, with shunt trip coil of 230V AC with push button for circuit breaker manual tripping, neon live cable indicators with SF6 gas pressure monitor.included SCADA intigrated system inbuilt in system.	No	6	4,68,958.00	28,13,748.00
					Rs.	2,54,10,504.0
		SUB TOTAL				
		SECTION - 3.0 ELECTRICAL PANELS INSTALLATION				
3.0		Supply, Unloading at site, shifting to final location, assembling, leveling, grouting, erecting, testing and commissioning of following panels as per drawings. Any sort of fabrication work required for erection of panel at site shall be done by the contractor. The contractor shall also check for all the loose joints and continuity of the panel. Any physical or technical defects envisaged by the contractor shall be brought to consultants knowledge.				
3.1	MR	Typical LT Panel for 1250 KVA Compact Sub Station	No	7	10,33,875.00	72,37,125.00

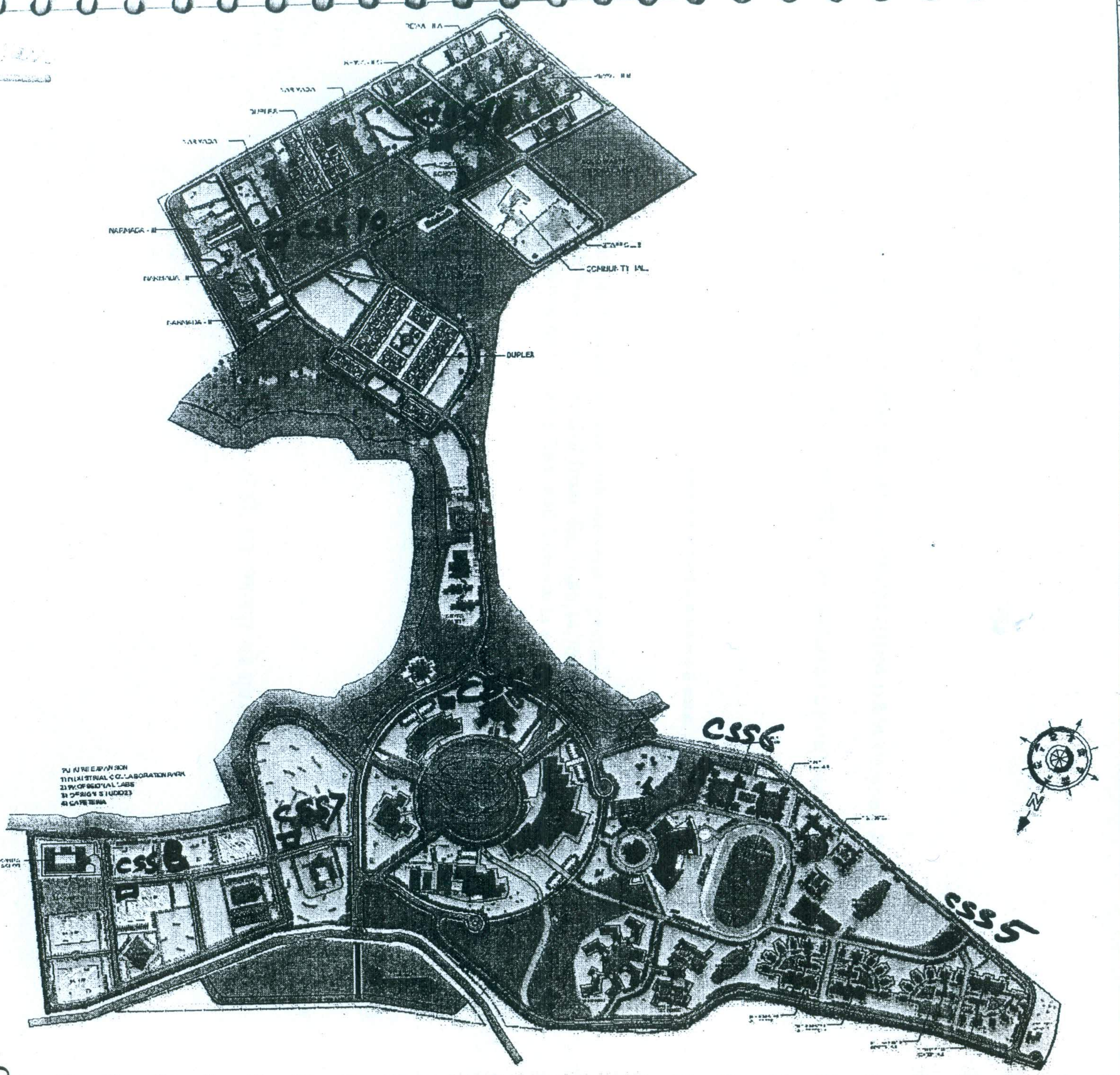
SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		INCOMERS 1 nos. 2000Amp 4 pole ACB EDO, 50 KA with static releases **INDICATING PANEL** All Incoming MCCB shall have digital Ammeter / Voltmeter with inbuilt selector switch (EM6400 / EM6436) C.T. shall be of 15VA class 1 type and shall be resin cast type 3 nos. phase LED type indicating lamps; each lamp shall have one toggle switch backed up with HRC fuse. 3 nos. indicating LED lamp on each incomer feeder for indicating the status of feeder. Incomer panels shall be suitable for terminating suitable 6 nos. 3.5 core 300 sqmm A2XFY cable entry required. **BUS BARS** 2000AMP. 500 Volts, 3 phase 50 Hz FP Copper bus bars of suitable length - Current ratio shall be 1 sq mm = 1.2 A **OUTGOINGS -** 1 no. 1250 AMPS TP ACB, 50 KA with Static Release 3 no.630 AMPS FP MCCB, 35 KA with Static Release 3 no.400 AMPS FP MCCB, 25 KA with Static Release 4 no.200 AMPS FP MCCB, 25 KA with Static Release 2 no.100 AMPS FP MCCB, 25 KA with thermal magnetic releases 2 no. 63 AMPS FP MCB, 10 KA with thermal magnetic releases				
3.2	MR	External Lighting panel as per drawing at Panel room	No	4	79,988.00	3,19,952.00
		INCOMERS 1 no. 100Amp FP MCCB, 16 KA with thermal magnetic releases contactor **INDICATING PANEL** 63AMP FP Digital 7 Days 24 Hrs. programmable timer with suitable contactor - 2 nos. 3 nos. phase LED type indicating lamps; each lamp shall have one toggle switch backed up with HRC fuse. 3 nos. indicating LED lamp on each incomer feeder for indicating the status of feeder. Incomer panels shall be suitable for terminating suitable nos. 3.5 core 35sqmm A2XFY cable entry				

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		BUS BARS 100 AMP. 500 Volts, 3 phase 50 Hz FP Copper bus bars of suitable length - Current ratio shall be 1 sq mm = 1.2 A				
		OUTGOINGS - 3 no. 63 AMP FPMCB, C curve 10KA 3 no. 40 AMP FPMCB, C curve 10KA 3 no. 16 AMP DP ELMCB, 100 mA 3 no. 25 AMP DP ELMCB, 100 mA				
3.3	MR	Supply, Installation, testing & commissioning of APFCR panel for 500 KVAR, 16stage - as per SLD drawing.	no	7	6,36,438.00	44,55,066.00
		INCOMERS 1 no. 1250 AMPS TP ACB, EDO with static releases. (35 KA)				
		Micro processor based automatic power factor control relay (including power factor meter) in 16 steps for automatic cut off or add on capacitor units to keep the power factor at 0.95 to unity with variation of loads. All associated auxillary contractors				
		BUS BARS 1250 AMP. 500 Volts, 3 phase 50 Hz TPN high conductivity electrolytic Copper bus bars of suitable length - current ratio 1 sq mm = 1.2 A.				
		OUTGOINGS - Fix type capacitor : 1 no. of 200AMPS TP MCCB, 25KA, of 50 KVAR capacity, auto manual selector switch, start stop push button, on/off indicating lamps complete including 50 KVAR APP type Capacitors bank with interconnection. Fix type capacitor : 1 no. of 125AMPS TP MCCB, 25KA, of 25 KVAR capacity, auto manual selector switch, start stop push button, on/off indicating lamps complete including 25 KVAR APP type Capacitors bank with interconnection. 5 no. of 200AMPS TP MCCB, 25KA, and capacitor duty switching contactor for 50 KVAR capacity, auto manual selector switch, start stop push button indicating on/off indicating lamps and delay timer complete including 50 KVAR APP type Capacitors bank with interconnection. 3 no. of 125AMPS TP MCCB, 16KA, and capacitor duty switching contactor for 25 KVAR capacity, auto manual selector switch, start stop push button indicating on/off indicating lamps and delay timer complete including 25 KVAR APP type Capacitors bank with interconnection.				

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		4 no. of 63AMPS TP MCB and capacitor duty switching contactor for 15 KVAR capacity, auto manual selector switch, start stop push button indicating on/off indicating lamps and delay timer complete including 15 KVAR APP type Capacitors bank with interconnec 4 no. of 40AMPS TP MCB and start stop push button indicating on/off indicating lamps and delay timer complete including 10 KVAR APP type Capacitors bank with interconnections.				
		SUB TOTAL			**Rs.**	**1,20,12,143.00**
		SECTION - 4.0 CABLES & CABLE TERMINATION				
4.0	MR	Procuring, supplying, transporting, unloading and storing of 1.1 KV, XLPE insulated grade copper / aluminum cables as described below. All cables shall be as per specifications.				
4.1	MR	300 sq mm x 3.5 C A2 X FY cable	RMT	7028	1,356.00	95,29,968.00
4.2	MR	35 sq mm x 3.5 C A2 X FY cable	RMT	60	215.00	12,900.00
4.3	MR	10 sq mm x 4 C A2 X FY cable	RMT	4300	129.00	5,54,700.00
4.4	MR	240 sqmm x 3C 11KV HT XLPE cable - (1900 mtr CABLE ALREADY AT SITE STOCK)	RMT	4197	1,543.00	64,75,971.00
		SUB TOTAL			**Rs.**	**1,65,73,539.00**
		SECTION -5.00 EXTERNAL ELECTRIFICATION				
5.1	MR	1200 mm dia ceiling fan of high speed double ball bearing five star rating white colour fan crompton make. (supply included)	No	14	1,678.00	23,492.00
5.2	MR	450 mm dia exhaust fan of PVC body with louvers. Usha make - lexus model or approved equivalent (supply included)	No	14	2,207.00	30,898.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
5.3	MR	Supply, installation, testing and commissioning of **8 mtr above ground Octagonal, single arm poles** for mounting of 45W LED fixture at 8 mtr height with help of Arm. The rates shall be inclusive of necessary foundation (minimum 600 x 600 x 600 mm) with anchor bolts etc complete. Supply of hot dipped galvanized (in single dip to average 70 micron) octagonal pole made of 4mm thick steel plate having base plate 240x240x16mm window and flush cover with locking arrangement at suitable height from base for cable termination block pole suitabale reinforced with welded steel section at window cut section to make the strength of pole unaffected, including temple and anchor plate 240x240x3mm with 4 nos 700mm long 20mm dia foundation bolts (EN8 grade),8 metre high, minimum dia 162 mm at bottom and 75mm at top,Supply and fixing following street light pole bracket on existing pole made out of 50mm dia MS 'B class pipe welded to 300 mm long MS pole canopy of suitable dia at a angle of 102.50 including having MS triangular stiffener of size 150x50 x 5mm thick, making arrangement for lighting the bracket with pole by providing suitable size heavy duty nuts and bolts in canopy, painting with one coat of approved steel primer etc. Single Over Hang 1.50 metre Long as required.	No	145	21,500.00	31,17,500.00
5.4	MR	Supply, installation, testing and commissioning of **8 mtr above ground Octagonal, single arm poles** for mounting of 45W LED fixture at 8 mtr height with help of Arm. The rates shall be inclusive of necessary foundation (minimum 600 x 600 x 600 mm) with anchor bolts etc complete. Supply of hot dipped galvanized (in single dip to average 70 micron) octagonal pole made of 4mm thick steel plate having base plate 240x240x16mm window and flush cover with locking arrangement at suitable height from base for cable termination block pole suitabale reinforced with welded steel section at window cut section to make the strength of pole unaffected, including temple and anchor plate 240x240x3mm with 4 nos 700mm long 20mm dia foundation bolts (EN8 grade),8 metre high, minimum dia 162 mm at bottom and 75mm at top,Supply and fixing following street light pole bracket on existing pole made out of 50mm dia MS 'B class pipe welded to 300 mm long MS pole canopy of suitable dia at a angle of 102.50 including having MS triangular stiffener of size 150x50 x 5mm thick, making arrangement for lighting the bracket with pole by providing suitable size heavy duty nuts and bolts in canopy, painting with one coat of approved steel primer etc. Single Over Hang 1.50 metre Long as required.	No	38	90,000.00	34,20,000.00

SR.	ITEM CODE	PARTICULAR	UNIT	QTY	RATE	AMOUNT
		Supply, Isntallation, Testing and Commissioning of Solar panel of street light with capacity 200Wp, solar cells polycrystalline silicon cells, make of cell q cell/ bosch, solar cell efficiency min 14%, junction box IP65, IEC 61215, mounting frame powser coated. Battery and Battery box : capacity 12V,200Ah @ C10, type Lead-acide tubular battery of Low maintance, Permitted depth of discharge 75%, Battery Backup 30hours Mounting position Bottom Battery box material & protection Pre-coated galvanized sheet of >1 mm thickness, Battery box protection powder coating of 60micron thickness, Mfg.Exide,HBL,AMCO. Charge controller: type MPPT (micro processor based), Rating 12V,7.5A, Efficiancy 94%, noload current less than 10mA, enclosure for charger IP65. make PHILIPS/PHOCOS/SPECCA.				
					Rs.	65,91,890.00
		SUB TOTAL				
		TOTAL COST FOR ELECTRICAL WORKS (NDSR ITEMS)				6,07,85,742.00



REVISION

DISTRIBUTION OF PRINT

ROAD NETWORK & SITE LAYOUT PLAN

PROJECT

PROPOSED CAMPUS FOR INDIAN INSTITUTE OF INFORMATION TECHNOLOGY DESIGN & MANUFACTURING AT JABALPUR

SCALE: 1:2000	IIITDM RD-LY-01
DATE: 08.02.2012	
DRAWN:	
CHECKED: A.S. JADDA	

DATTA AND DATTA ASSOCIATES
ARCHITECTS, ENGINEERS, TOWN PLANNERS & INTERIOR DESIGNERS

भारत सरकार
कार्यालय अधीक्षण अभियंता
भोपाल केन्द्रीय परिमण्डल, कें. लो. नि. वि.
'निर्माण सदन',52–ए, अरेरा हिल्स, भोपाल–462011

पत्र क्रं: . 23(175)/BCC/2012-13/ 153 भोपाल/दिनांक 30 /01/2013

प्रति,

श्री पुनित टंडन,
अधि. योजना एवं विकास,
PDPM-IIITDM, Jabalpur.

विषयः- :– **C/o Technology incubation centre at PDPM IIIDM,D&M Campus, Jabalpur (M.P)**

संदर्भ :– आई., आई., आई., टी.डी. एम /बि.एवं का **/2012/12/12/Estt(bldg) Dated:- 17/12/2012**

****

Please find attached here with the vettetd preliminary Estimate sent vide letter referrd above. The cost of the work has increased from Rs. 16,66,44,700/- to 17,90,73,300/-. The major change in the cost is due to addition of 4% VAT Tax and increase in cost index of Jabalpur from 143 to 158%.

संलग्न :– प्रारंभिक प्राक्कलन

कार्यपालक अभियंता(योजना)
भोपाल केन्द्रीय परिमण्डल,
कें. लो. नि. वि., भोपाल

प्रतिलिपि:–

1. निदेशक आई., आई., आई., टी.डी. एम जबलपुर को सुचनार्थ ।

कार्यपालक अभियंता(योजना)

भारत सरकार

अधीक्षण अभियंता ,भो.के.प.
केंद्रीय लोक निर्माण विभाग
52- ए, अरेरा हिल्स
भोपाल

प्रारम्भिक प्राक्कलन

प्रा. संख्या : - /अ.अ../भोकेप./2012–2013.

NAME OF WORK: - C/o Technology incubation Centre at PDPM, IIIT D&M Campus, Jabalpur(M.P)

लागत मूल्य :- ₹ 17,90,73,300/- i/c 3% contingencies

Annexure B&WC/2013/1/A-5

PLINTH AREA ESTIMATE

Name of Works: - C/o Technology incubation centre for IIIT D & M at Jabalpur (MP)

REPORT

History:- This Preliminary estimate amounting to Rs. 17,90,73,300/-- including 3% contingencies and 5.618% consultancy fee has been framed to meet the probable cost of the above work and for obtaining Administrative Approval & Expenditure Sanction from the including contingencies.

Design & Scope: - The Preliminary estimate has been framed based on the following architectural drawings, developed by consultant architects M/s Architects Atelier, Chandigarh on-Behalf of PDPM IIIT D&M, Jabalpur (MP)

Sr. No.	Drg. No.	Description
1.	A-01	Ground Floor Plan
2.	A-02	First Floor Plan
3.	A-03	Second & third Floor Plan
4.	A-04	Front elevation
5.	A-05	Left back side elevation
6.	A-06	Right back side elevation
7.	A-07	Section

The estimates provides for construction of Technology incubation centre in Ground +3 upper floor constructions. The building shall be RCC framed Structure. Capacity of soil information is assumed @ **180Kn/Sqm,** yet to be determined.

The Incubation Centre building comprises of the following facilities :

1) Offices/Stores– 20 Nos.
2) Conference Halls– 2 Nos.
3) Seminar Room–2Nos.

Providing decent workplace to achieve maximum efficiency, positive work culture and better co-ordination were the main objectives of the project. As one enters the building at the ground floor, a central 3-tier top-lit atrium covered with poly-carbonate sheet at the top welcomes you. The central space sustains a well-lit and stimulating setting that weaves through and connects the whole structure. Pseudo Wall with funder max cladding and niches in at each level is implemented as the main highlighting elevational feature enhancing the massing of the building.The building shall be centrally air conditioned with totally automated building management & automation system. The civil works shall consist of the following:

Excavation: The site contains black cotton soil of about 300 mm depth after which we have ordinary rock of about 600 mm depth & them hard rock for another 600 mm depth as shown the soil bearing report.

Foundations: The building shall comprise of isolated footing as the soil bearing capacity is qu high. All the foundations shall be of Reinforced Cement Concrete.

DPC: The plinth of the building is raised by about 900mm. there shall be a plinth beam running all around of about 380x 450 mm hence there is no need of providing an additional DPC.

Structure: The building shall comprise of an RCC framed structure with RCC flat roof on the entire area.

Walls: The infill walls shall be made of locally available best quality bricks plastered on both side

Flooring: The entire building shall have 600x 600 vitrified flooring, the staircases shall ha granite flooring, the toilet shall have ceramic tiles flooring.

Finishing: The entire plastered area shall be finished with oikos ultrashield paint. The ceilings shall not be painted at all because of false ceiling. The seminar hall and conference hall walls shall have sound insulating panels of himalyan acoustics/eomac/optra, the entire building shall have fal ceiling and Optra ceilings of glass wool for better acoustics. The ceiling shall be 600x600 mm modular ceiling of 15mm grid with classic lite tiles with Gypsum board bandings on the sides alo the perimeters. The office area shall have Dune premium tile ceiling.

Joinery: The toilets ventilator & doors chowkhats shall have aluminium joinery. The rest of the doors chowkhats shall be of second class teak wood. The doors shall be of pre-laminated flush doo shutters for the entire building including. The entire glazing shall of curtain walls with 24 mm thk double glass units as details. The main entrance shall have spider fitting with automatic doors. The internal partitions shall be 12 mm thk toughened glass to segregate AC areas from non AC area The entire railing shall be of stainless steel in 304 grade. The central courtyard shall be covered using 16mm thk multiwall polycarbonate sheet.

Services: The building shall have all the services running exposed on the concrete ceiling to allow for ease of maintenance. They shall be concealed behind the false ceilings. The entire building sha have computer networking cables & UPS supply running to every room. Provision shall be made for projectors in every room. There shall be occupancy sensors at all location to switch on/off the lighting automatically. The toilets shall have automatic flushing urinals. The entire piping shall b PPR for water supply. There is a provision for handicap toilet & handicap access to all locations.

SPECIFICATION: the work shall be carried out as per CPWD specifications 2009 Vol I to II.

RATE: - As per PAR 2007 with upto date correction slips duly enhanced by proposed cost index of 143 for Jabalpur as on 01.05.12.

COST: - Rs. 17,90,73,300/-/- including 3% contingencies and consultancy fee.

The cost projected in this estimate is liable to revision due to probable escalation in co of construction apart from other reasons such as change in scope, area, design, specification etc. if, and as desired by the client department at a later date.

95

Assistant Engineer (P)
Central Circle

Executive Engineer (P&A)

GENERAL ABSTRACT OF COST

Name of Work : - C/o Technology incubation Centre at PDPM IIIT, D&M Campus, Jabalpur (MP)

S.No.	DETAILS OF SUB HEAD	As per Original PE		
		CIVIL	ELECT.	TOTAL
1	Building Works	10,33,71,198	4,06,80,575	**14,40,51,773**
2	Bulk Services	5332500	320000	**56,52,500**
	TOTAL	**10,87,03,698**	**4,10,00,575**	**14,97,04,273**
	Add for GRIHA specifications and items like Aac blocks , LED lights	5.00%		74,85,214
	Add for Quality assurance @ 1%	1.00%		14,97,043
	Add for labour cess @ 1%	1.00%		14,97,043
	Add for VAT @ 4%	4.00%		59,88,171
	Architects fee ~~@5.618%~~ 5.056	5.06 ~~5.62%~~		~~84,10,386~~ 7569048
	Add for contigencies @ 3%	3.00%		44,91,128
			TOTAL	~~17,90,73,258~~ 17823192
			Say	~~17,90,73,300~~ 17823200

(Rupees Seventeen Crore Ninety Lacs Seventy Three Thousand Three Hundred Only)

Asstt. Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Superintending Engineer
Bhopal Central Circle,
Central P.W.D., Bhopal.

ABSTRACT OF COST

Name of Work : - C/o Technology incubation Centre at PDPM IIIT, D&M Campus, Jabalpur (MP)

Sl. No.	Sub Head and Item of work	Qty	Rate	Unit	Amount	
	SH-I : MAIN BUILDING					
	Plinth Area					
	GROUND FLOOR	914		sqm		
	FIRST FLOOR	745		sqm		
	SECOND FLOOR	824				
	THIRD FLOOR	824				
		3307.00		sqm		
	Say	3307		sqm		
1	CIVIL					
1.1	RCC Framed Structure of normal floor height of 3.35m.	3,307	13,200	Sqm	4,36,52,400	PAR' 07
1.2	Extra for additional floor height (4.5 – 3.35=1.15m)	3307	575	Sqm	19,01,525	PAR' 07
					4,55,53,925	A
1.3	Every 0.30 m deeper foundation over normal depth of 1.2 (on GF only)	914	150	Sqm	1,37,100	PAR' 07
1.4	Extra for 0.30 metre higher plinth over normal 0.6 m(0.9m)	914	150	Sqm	1,37,100	PAR' 07
1.5	Extra for resisting earthquake forces	3307	630	Sqm	20,83,410	PAR' 07
1.6	Extra for larger modules over 35 sqm	3307	990	Sqm	32,73,930	PAR' 07
1.7.1	Extra for high performance curtain wall glass instead of reflective or double float glass	679	8,070	Sqm	54,79,530	MR
1.7.2	Extra for polycarbonate dome in central courtyard	93	3,766	Sqm	3,50,238	MR
1.7.3	Extra for Fundermax/peforated aluminium sheet on exterior wall	2,000	2,690	Sqm	53,80,000	MR
1.7.4	Extra for False ceiling @Rs 646/sqm of carpet area	2,646	646	Sqm	17,09,058	MR
1.7.5	Extra for acoustic wall insulation in seminar halls	1,153	2,690	Sqm	31,01,570	MR
					6,72,05,861	
	Services					
1.8	Internal water supply and sanitary installation on 'A'	4,55,53,925	4	%	18,22,157	PAR' 07
1.9	External service connection on 'A'	4,55,53,925	5	%	22,77,696	PAR' 07
				Total	7,13,05,714	
	Enhancement over PAR 2007 rate as per approved cost index of 158 i.e. add @ 58%				3,20,65,484	
				Total	10,33,71,198	'X'
			TOTAL =		10,33,71,198	

2 ELECTRICAL

2.1	Internal electric installation on A	4,55,53,925	12.5	%	56,94,241	PAR'07
2.2	External service connection on A	4,55,53,925	-	-	-	PAR'07
2.3	Telephone conduits and wiring on A	4,55,53,925	0.5	%	2,27,770	PAR'07
2.4	Power wiring & plugs on A	4,55,53,925	4.0	%	18,22,157	PAR'07
2.5	Computer conduiting on A	4,55,53,925	0.5	%	2,27,770	PAR'07
2.6	Lightning conductors upto 4 storeyed building	4,55,53,925	0.5	%	2,27,770	PAR'07
2.7	Add for 2 nos. 16 passenger lifts	2	19,50,000		39,00,000	PAR' 07
2.8	Fire fighting - automatic alarm system	3307	300	Sqm	9,92,100	PAR' 07
2.9	Fire fighting - wet riser system	3307	300	Sqm	9,92,100	PAR' 07
					1,40,83,908	
2.10	Extra for airconditioning @ Rs 60,000/ ton (15sqm/ton)	3307	60,000		1,32,28,000	MR
2.11	Add for photovoltaic cells/solar panels of 10Kwp	1	30,00,000	lumpsum	30,00,000	MR
2.12	Add for CCTV & Access control system	1	6,00,000	lumpsum	6,00,000	MR
2.13	Add for Exchange & public address system	1	6,00,000	lumpsum	6,00,000	MR
2.14	Add for Audio System in seminar halls (6 nos)	1	10,00,000	lumpsum	10,00,000	MR
				Total	3,25,11,908	
	Enhancement over PAR 2007 rate as per approved cost index of 158 i.e. add @ 58%				81,68,667	
				Total	4,06,80,575	
				Total	4,06,80,575	

Asstt. Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Name of Work : - C/o Technology incubation Centre at PDPM IIIT, D&M Campus, Jabalpur (MP)

Sl. No.	Sub Head and Item of work	As per Revised PE				
		Qty	Rate	Unit	Amount	
	SH-III : BULK SERVICES					
	1) Civil					
1.1	Over Head Tank without independent staging	75000	9.00	Litre	675000	PAR,2007
1.2	Under ground sump including for fire fighting	300000	9.00	Litre	2700000	PAR,2007
				TOTAL	3375000	
	Enhancement over PAR 2007 rate as per approved cost index of 158 i.e.add @ 58% on PAR 2007 items				1957500	
				TOTAL	5332500	
	2) Electrical					
2.1	Booster pumps for underground sump including accessories	2	1,60,000.00	Each	3,20,000	MR
				TOTAL	320000	
	Enhancement over PAR 2007 rate as per approved cost index of 158 i.e.add @ 58% on PAR 2007 items				-	
				TOTAL	320000	

Asstt. Engineer(P)
Bhopal Central Circle,
Central P.W.D., Bhopal.

Executive Engineer(P&A)
Bhopal Central Circle,
Central P.W.D., Bhopal.

भारत सरकार
कार्यालय अधीक्षण अभियंता
भोपाल केन्द्रीय परिमण्डल, के. लो. नि. वि.
'निर्माण सदन',52 ए, अरेरा हिल्स, भोपाल–462011

पत्र क्रं: . 23(175)/BCC/2012-13/ 117 -दि भोपाल/दिनांक 18/01/2013

प्रति,

श्री पुनित टंडन,
अधि. योजना एवं विकास,
PDPM-IIITDM, Jabalpur.

विषय:- :— **C/o multi-utility centre at PDPM-IIITDM, Jabalpur.**

संदर्भ :— आई., आई., आई., टी.डी. एम /बि.एवं का **/2012/12/12/Estt(bldg)**
Dated:- 17/12/2012

****

Please find attached here with the vetteld preliminary Estimate sent vide letter referrd above. The cost of the work has increased from Rs. 9,05,45,700/- to 10,55,09,200/-. The major change in the cost is due to addition of 4% VAT Tax and increase in cost index of Jabalpur from 143 to 158%.

संलग्न :— प्रारंभिक प्राक्कलन

कार्यपालक अभियंता(योजना)
भोपाल केन्द्रीय परिमण्डल,
कें. लो. नि. वि., भोपाल

प्रतिलिपि:—

1. निदेशक आई., आई., आई., टी.डी. एम जबलपुर को सूचनार्थ ।

कार्यपालक अभियंता(योजना)

GOVERNMENT OF INDIA
CENTRAL PUBLIC WORKS DEPARTMENT

Name of work :- C/o Multi Utility Centre at PDPM IIIT, D&M, Campus Jabalpur (M.P)

REPORT

HISTORY: - This Preliminary Estimate of the above cited work amounting to Rs. **10,55,09,200/-** i/c 3% contingencies and 5.618% consultancy fee has been framed to need the probable cost of the above work and for obtaining Administrative Approval & Expenditure Sanction from the including contingencies.

DESIGN & SCOPE: - The Preliminary estimate has been framed based on the following Architectural drawings received from Director, PDPM IIIT D&M, Jabalpur and developed by consultant architects M/s Architects Atelier Chandigarh on Behalf of PDPM IIIT D&M Jabalpur (MP)

Sl No.	Drawing No	Description
1	A-01	Ground Floor Plan
2	A-02	First Floor Plan
3	A-03	Elevations
4	A-04	Section

The estimates provides for construction of Multi Utility Centre in Ground +1 upper floor constructions. The building shall be RCC framed structure. Capacity of soil information is assumed at 180 km/sqm yet to be determmed.

Te Multi utility building comprises of the following facilities.

1. Bank - 2 Nos.
2. PO 1 Nos.
3. Restaurant 1 No
4. Shops - 18 Nos
5. Community Service Halls- 1 No.

The requirement were simple enough but the concept how these requirements are to be dispersed into spaces was challenging. Intelligently developed working on an open concept creating a connection between the interior and the exterior. Faced with linear layout the length of the space was handled intelligently meaning the both ends into curvature. The building is modern in all aspects such as planning use of modern materials. Its utility minimalistic use of features. Planned in levels, which gives the building a different dimension using pergolas as the main elevational feature. Structural Glazing with heat reflecting glass has been used to reduce transmission of heat to internal areas. The civil works shall consist of the followings.

Excavation: The site contains black cotton soil of about 300 mm depth after which we have ordinary rock all about 600 mm depth & them hard work for another 600 mm depth as shown the soil bearing report.

Foundation:- The Building shall compose all isolated feature as the soil bearing capacity is quite high with the foundation shall be reinforced cement concrete

DPC:- The plinth of the building is raised by about 900 mm. there shall be a plinth beam running all around of about 38x450 mm hence there is no need of providing an additional DPC.

Structure:- The building shall comprise of an RCC framed structure with RCC flat roof on the entire area.

Walks: The infill walls shall be made of locally available best quality bricks plastered on both sides.

Flooring:- The entire building shall have 600x600 vitrified flooring, the staircase shall have granite flooring. The toilet shall have ceramic tiles flooring.

Finishing:- The entire plastered area shall be finished with oikos ultrashield paint. The façade shall be stone clad using stone veneer of 1 mm thickness.

Joinery: The toilets ventilator & Doors Chowkhats shall have aluminium joinery. The rest of the doors chowkhats shall be of certified green wood. The doors shall be of pre-laminated flush door shutters for the entire building including. The entire railing shall be of stainless steel in 304 grade and transparent glass. Rolling shutter is used in shops.

Services: The building shall have all the services running concealed in the concrete ceiling. There shall be occupancy sensors at all location to switch on/ off the lighting automatically. The toilets shall have automatic flushing urinals The entire piping shall be PPR for water supply. There is a provision for handicap toilet & handicap access to all locations.

SPECIFICATION: - Work shall be carried out as per CPWD specifications 2009 Vol. I & II with upto date correction slip.

RATE :- DPR 2007 + Cost Index @ 58%

COST :- Rs. 10,55,09,200/- i/c 3% contingencies.

Assistant Engineer (P),
Bhopal Central Circle,
CPWD, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
CPWD, Bhopal

GENERAL ABSTRACT OF COST

Name of work :- C/o Multi Utility Centre at PDPM IIIT, D&M, Campus Jabalpur (M.P)

Details of Subhead	Civil	Electrical	Total
I- MAIN BUILDING	69528513.00	18310456.00	87838969.00
II BULK SERVICES	284400.00		
Total	69812913.00	18310456.00	87838969.00
		Total :-	87838969.00
Add 5% for GRIHA specifications and items like Aac blocks, LED lights			4391948.00
Add 1% Quality Assurance :			878390.00
Add Labour Cess 1% :			878390.00
Add 4% VAT :			3513559.00
Architects fees @ ~~5.618%~~ 5.056%			444138.00 ~~4934793.00~~
		Total :-	~~102436049.00~~ 101942394.00
Add 3% contingecies			3058272.00 ~~3073081.00~~
		Total :-	105000666.00 ~~105509130.00~~
		SAY :-	Rs. 105000700.00 ~~105509200.00~~

(Rs. Ten Crore Fifty Five Lacs Nine Thousand Two Hundred only)

Assistant Engineer (P)
Bhopal Central Circle,
CPWD, Nirman Sadan, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,,
CPWD, Nirman Sadan, Bhopal

Superintending Engineer
Bhopal Central Circle,
CPWD.Nirman Sadan, Bhopal.

ABSTRACT OF COST

Name of work :- C/o Multi Utility Centre at PDPM IIIT, D&M, Campus Jabalpur (M.P)

Item No.	Sub head and item of work	Quantity	Rate	Unit	Amount
	SH- MAIN BUILDING				
	Plinth Area				
	Ground Floor	**2011.00**			
	First Floor	**970.00**			
		2981.00			
(I)	**Civil Portion**				
1.1	RCC framed structure fo normal floor height of 3.35 mt.	2981.00	13200.00	sqm.	39349200.00 A
1.2	Every 0.30 m deeper foundation over normal depth of 1.2 (on GF only)	914.00	150.00	sqm.	137100.00
1.3	Extra for Additional floor height(4.5-3.35=1.15m)	1280.00	575.00	sqm.	736000.00 A
1.4	Extra for 0.30 metre higher plinth over normal 0.6m(0.9m)	2011.00	150.00	sqm.	301650.00
1.5	Extra for resistant earth quake forces	2981.00	630.00	sqm.	1878030.00
				Total A	40085200.00
(II)	**SERVICES**			Total	42401980.00
1.6	Internal water supply and sanitary installation on 'A'	40085200.00	4.00	%	1603408.00
				Total :	**44005388.00**
	Enhancement over DPAR 2007 rate as per approved Cost Index of 58%				25523125.00
				Total :	**69528513.00**
(III)	**Electrical Portion**				
2.1	Internal electrical installations on 'A'	40085200.00	12.50	%	5010650.00
2.2	External service connection on 'A"	40085200.00	5.00	%	2004260.00
2.3	Telephone conduits and wiring on 'A'	40085200.00	0.50	%	200426.00
2.4	Power wiring & plugs on 'A'	40085200.00	4.00	%	1603408.00
2.5	Computer conduiting on 'A'	40085200.00	0.50	%	200426.00
2.6	Lighting conductors upto 4 storeyed building	40085200.00	0.50	%	200426.00
2.7	Add for 1 No goods lifts (1 ton)	1.00	1475000.00	Sqm	1475000.00
2.8	Fire fighting automatic alarm system	2981.00	300.00	Sqm	894300.00
				Total "B" :	11588896.00
	Enhancement over DPAR 2007 rate as per approved Cost Index of 58% on B				6721560.00
				Total	18310456.00

Assistant Engineeer (P)
Bhopal Central Circle
CPWD, Nirman Sadan, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
CPWD, Nirman Sadan, Bhopal

ABSTRACT OF COST

Name of work :- C/o Multi Utility Centre at PDPM IIIT, D&M, Campus Jabalpur (M.P)

Item No.	Sub head and item of work	Quantity	Rate	Unit	Amount
	Bulk Services				
	1 Civil				
1.1	Over Head Tank without independent staging	20000.00	9.00	Litre	180000.00
				Total :	**180000.00**
	Enhancement over DPAR 2007 rate as per approved Cost Index of 58%				104400.00
				Total :	**284400.00**

Assistant Engineeer (P)
Bhopal Central Circle
CPWD, Nirman Sadan, Bhopal

Executive Engineer(P&A)
Bhopal Central Circle,
CPWD, Nirman Sadan, Bhopal

CLIENT: PDPM INDIAN INSTITUTE OF INFORMATION TECHNOLOGY DESIGN AND MANUFACTURING, DUMNA AIR PORT ROAD, P.O. KHAMARIYA, JABALPUR-482005

ARCHITECTS : DATTA AND DATTA ASSOCIATES, 101 SNEH SHILP, 66,SWASTIK SOCIETY, NAVRANGPURA, AHMEDABAD - 380009

Phone: +917926407248, 26462618 Fax: +91792 6401242

PROJECT: DEVELOPMENT OF PDPM IIIT DM CAMPUS JABALPUR -- INFRASTRUCTURE DEVLOPMENT

TOTAL ESTIMATE (BOQ) -- FOR

PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.

BASED ON GOVERNMENT OF DELHI SCHEDULE OF RATES -- 2012

CLIENT: PDPM INDIAN INSTITUTE OF INFORMATION TECHNOLOGY DESIGN AND MANUFACTURING, DUMNA AIR PORT ROAD, P.O. KHAMARIYA, JABALPUR-482005

ARCHITECTS : DATTA AND DATTA ASSOCIATES, 101 SNEH SHILP, 66,SWASTIK SOCIETY, NAVRANGPURA AHMEDABAD-380009

PROJECT: DEVELOPMENT OF PDPM IIIT DM CAMPUS JABALPUR --- INFRASTRUCTURE DEVLOPMENT

BASED ON GOVERNMENT OF DELHI SCHEDULE OF RATES -- 2012

ABSTRACT - (BOQ) **PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.**

ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		EARTH WORK				
1 a	2.6	Earth work in excavation by mechanical means (Hydraulic excavator) / manual means over areas (exceeding 30 cm in depth. 1.5 mt in width as well as 10 sqm on plan) including disposal of excavated earth, lead upto 50 m and lift upto 1.5 mt, disposed earth to be levelled and neatly dressed.	cum	1850.00	**129.35**	239297.50
		EARTH WORK IN EMBANKMENT				
b	2.3	Banking excavated earth in layers not exceeding 20 cm. in depth, breaking clods, watering, rolling each layer with ½ tonne roller, or wooden or steel rammers, and rolling every 3rd and top-most layer with power roller of minimum 8 tonnes and dressing up, in embankments for roads, flood banks, marginal banks, and guide banks etc., lead upto 50 m and lift upto 1.5 m. -- All kinds of soil	cum	3570.00	**181.25**	647062.50
c		Earth work in excavation by mechanical means (Hydraulic excavator) / manual means in foundation trenches or drains (not exceeding 1.5 m in width or 10 sqm on plan) including dressing of sides and ramming of bottoms, lift upto 1.5 m, including getting out the excavated soil and disposal of surplus excavated soil as directed, within a lead of 50 m.				
	2.8.1	All kinds of soil.	Cum	754.00	**130.80**	98623.20
2	2.9	Excavation work by mechanical means (Hydraulic excavator)/ manual means in foundation trenches or drains not exceeding 1.5m in width or 10 sqm on plan including dressing of sides and ramming of bottoms, lift upto 1.5 m, including getting out the excavated soil and disposal of surplus excavated soils as directed, within a lead of 50 m.				
a	2.9.1	Ordinary rock	cum	88.00	**212.00**	18656.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	2.9.3	Hard rock (blasting prohibited)	cum	46.00	**491.90**	22627.40
3	2.26	Extra for every additional lift of 1.5 m or part thereof in excavation /banking excavated or stacked materials.				
a	2.8.1	All kinds of soil.	Cum	211.00	**34.60**	7300.60
b	2.26.2	Ordinary or hard rock.	cum	23.00	**62.00**	1426.00
4	2.1	Excavating trenches of required width for pipes, cables, etc including excavation for sockets, and dressing of sides, ramming of bottoms, depth upto 1.5 m including getting out the excavated soil, and then returning the soil as required, in layers not exceeding 20 cm in depth, including consolidating each deposited layer by ramming, watering, etc. and disposing of surplus excavated soil as directed, within a lead of 50 m :				
	2.10.1	All kinds of soil				
a	2.10.1.1	Pipes, cables etc, not exceeding 80 mm dia.	metre	207.00	**101.40**	20989.80
b	2.10.1.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	3697.00	**165.60**	612223.20
c	2.10.1.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600 mm.	metre	26.00	**258.55**	6722.30
5	2.11	Extra for excavating trenches for pipes, cables etc. in all kinds of soil for depth exceeding 1.5 m, but not exceeding 3 m. (Rate is over corresponding basic item for depth upto 1.5 metre).				
a		Pipes, cables etc, not exceeding 80 mm dia.	metre	10.00	**136.89**	1368.90
b		Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	962.00	**223.56**	215064.72
c		Pipes, cables etc. exceeding 300 mm dia but not exceeding 600 mm.	metre	9.00	**349.04**	3141.38

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
6	2.13	Excavating trenches of required width for pipes, cables, etc, including excavation for sockets, depth upto 1.5 m including getting out the excavated materials, returning the soil as required in layers not exceeding 20 cm in depth, including consolidating each deposited layers by ramming, watering etc., stacking serviceable material for measurements and disposal of unserviceable material as directed, within a lead of 50m :				
	2.13.1	Ordinary rock :				
a	2.13.1.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	24.00	142.95	3430.80
b	2.13.1.2	Pipes, cables etc. exceeding 80 mm dia but not exceeding 300 mm dia.	metre	444.00	353.95	157153.80
c	2.13.1.3	Pipes, cables exceeding 300 mm dia but not exceeding 600mm dia	metre	3.00	407.30	1221.90
7	2.13.3	Hard rock (blasting prohibited)				
a	2.13.3.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	14.00	276.05	3864.70
b	2.13.3.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	300.00	683.50	205050.00
c	2.13.3.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	2.00	786.50	1573.00
8	2.14	Extra for excavating trenches for pipes, cables, etc. in ordinary/hard rock exceeding 1.5 m in depth but not exceeding 3 m. (Rate is over corresponding basic item for depth upto 1.5 metre.)				
	2.14.1	Ordinary rock :				
a	2.14.1.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	10.00	150.10	1500.98
b	2.14.1.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	77.00	371.65	28616.86
c	2.14.1.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	2.00	427.67	855.33
9	2.14.2	Hard rock (blasting prohibited)				
a	2.14.2.1	Pipes, cables etc. not exceeding 80 mm dia.	metre	10.00	289.85	2898.53

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	2.14.2.2	Pipes, cables etc. exceeding 80 mm dia. but not exceeding 300 mm dia.	metre	39.00	**717.68**	27989.33
c	2.14.2.3	Pipes, cables etc. exceeding 300 mm dia but not exceeding 600mm dia.	metre	1.00	**825.83**	825.83
10	2.25	Filling available excavated earth (excluding rock) in trenches, plinth, sides of foundations etc. in layers not exceeding 20cm in depth, consolidating each deposited layer by ramming and watering, lead up to 50 m and lift upto 1.5 m.	Cum	235.00	**83.80**	19693.00
11	1.1	Carriage of materials by mechanical transport including loading, unloading and stacking.				
		Earth				
a	i)	For a lead upto 1 Km.	Cum.	367.00	**82.78**	30380.26
b	ii)	For a lead upto 2 Km.	Cum.	237.00	**93.94**	22263.78
c	iii)	For a lead upto 3 Km.	Cum.	54.00	**104.98**	5668.92
d	iv)	For a lead upto 4 Km.	Cum.	54.00	**115.60**	6242.40
e	v)	For a lead upto 5 Km.	Cum.	41.00	**125.92**	5162.72
f	vi)	Beyond 5 Kms. and upto 10 Kms. (Add for every 1 Km.)	Cum.	40.00	**9.22**	368.80
		P.C.C. WORK				
12	4.1	Providing and laying in position cement concrete of specified grade excluding the cost of centering and shuttering - All work up to plinth level :				
a	4.1.8	1:4:8 (1 Cement : 4 coarse sand : 8 graded stone aggregate 40 mm nominal size).	cum	1134.00	**3593.30**	4074802.20
b	4.1	Providing and laying in position cement concrete of specified grade excluding the cost of centering and shuttering - All work up to plinth level :				
	4.1.10	1:5:10 (1 Cement : 5 coarse sand : 10 graded stone aggregate 40 mm nominal size).	cum	282.00	**3357.40**	946786.80

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		R.C.C. WORK				
13	5.33	Providing and laying in position machine batched and machine mixed design mix M-25 grade cement concrete for reinforced cement concrete work, using cement content as per approved design mix, including pumping of concrete to site of laying but excluding the cost of centering, shuttering, finishing and reinforcement, including admixtures in recommended proportions as per IS: 9103 to accelerate, retard setting of concrete, improve workability without impairing strength and durability as per direction of Engineer-in-charge.				
	5.33.1	All works upto plinth level.	cum	12.00	**5242.15**	62905.80
		FORM WORK				
14	5.9	Centering and shuttering including strutting, propping etc. and removal of form for :				
	5.9.5	Slab, beams, Walls girders, bressumers and cantilevers.	sqm	88.00	**262.25**	23078.00
		STEEL WORK				
15	5.22	Steel reinforcement for R.C.C. work including straightening, cutting, bending, placing in position and binding all complete upto plinth level.				
	5.22.6	Thermo-Mechanically Treated Bars.	kg	1200.00	**62.25**	74700.00
		PLASTERING AND POINTING				
16	13.16	6 mm cement plaster of mix :				
a	13.16.1	1:3 (1 cement: 3 fine sand)	sqm	126.00	**101.00**	12726.00
b	13.7	12 mm cement plaster finished with a floating coat of neat cement of mix :				
	13.7.2	1:4 (1 cement: 4 fine sand)	sqm	800.00	**153.45**	122760.00
17	19.15	Providing M.S. foot rests including fixing in manholes with 20x20x10 cm cement concrete blocks 1:3:				
	19.15.2	With 20 mm diameter round bar	Each	8.00	**193.15**	1545.20

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
18	16.69	Providing and laying at or near ground level factory made kerb stone of M-25 grade cement concrete in position to the required line, level and curvature, jointed with cement mortar 1:3 (1 cement: 3 coarse sand) including making joints with or without grooves (thickness of joints except at sharp curve shall not to more than 5mm), including making drainage opening wherever required complete etc. as per direction of Engineer-in-charge (length of finished kerb edging shall be measured for payment). (Precast C.C. kerb stone shall be approved by Engineer-in-charge).	cum	669.00	**5046.80**	3376309.20
19	16.68	Providing and laying 60mm thick factory made cement concrete interlocking paver block of M -30 grade made by block making machine with strong vibratory compaction, of approved size, design & shape, laid in required colour and pattern over and including 50mm thick compacted bed of fine sand, filling the joints with fine sand etc. all complete as per the direction of Engineer-in-charge.	sqm	6185.00	**536.65**	3319180.25
		RECYCLING WATER PIPE LINE -				
20	NS	Providing and laying PE 100 class HDPE pipes conforming to IS:4984:1995 in all kinds of strata. This includes jointing of pipes & fittings, trenching ,refilling etc. complete as per direction of Engineer in Charge.				
		110 mm dia pipe (PN 12.5)	metre	4075.00	**874.00**	3561550.00
21		Providing and laying PE 100 class HDPE pipes conforming to IS:4984:1995 in all kinds of strata. This includes jointing of pipes & fittings, making 5mm diaaholes at 30 cm c/c, trenching ,refilling etc. complete as per direction of Engineer in Charge.				
	18.7.3	25 mm dia pipe (PN 12.5)	metre	3691.00	**118.00**	435538.00
22	18.18	Providing and fixing half turn ball valve (brass) of approved quality etc complete :				
	18.7.3	25 mm nominal dia	each	169.00	**421.65**	71258.85
23		Making connection of HDPE distribution branch in HDPE main of following sizes by providing and fixing tee or coupler socket, including jointing the pipe etc. complete as per direction of Engineer in Charge:				
		110 x 110 x 25 mm	each	169.00	**250.00**	42250.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		ROAD SIDE FURNITURE AND SINAGE WORK -				
24	16.48	Painting road surface marking with adequate no. of coats to give uniform finish with ready mixed road marking paint conforming to IS : 164, on bituminous surface in white/yellow shade including cleaning the surface of all dirt, scales, oil, grease and foreign material etc. complete.				
	16.48.1	New work (Two or more coats).	sqm	451.00	**95.75**	43183.25
25	16.61	Providing Retro-reflective regulatory sign board of size 900mm dia meter made out of 2mm thick aluminum sheet, face to be fully covered with high intensity encapsulated lens type retro -reflective sheeting as approved by Engineer-in-charge . Letter, symbols, borders etc. will be as per IRC - 67 with required color scheme on the boards and with the high intensity grade A. The aluminum sheet to be fixed to M.S. frame of sq. hollow sections of size 40 x 40 x 4mm. The boards will be fixed to 2 No. 50 x 50 mm square post made of M.S. hollow section 50 x 50 x 4 mm, 4m long welded to the frame with adequate anti-theft arrangement .Sheet work to be painted with two or more coats of synthetic enamel paint over an under coat (primer) and back side of aluminum sheet to be painted with two or more coats of epoxy paint including appropriate priming coat complete in all respects as per direction of Engineer-in-charge.	sqm	32.00	**5061.65**	161972.80
26		Providing @ 3 mm th Fiber glass or PVC @ 200 lit capacity Road site Dust- Bin of approved Shape and color. With Lead arrangement and supporting frame etc. as per detail drawings, approved sample all complete and as directed by the Architect/ Engineer-in-Charge	each	13.00	**7500.00**	97500.00
27		Providing and fixing Bench in Cement Concrete (M-35) & req. reinforcement and with Terrazzo finish of overall size 2.1 m x 0.6 m x 0.4 m (height) including Concrete legs for contact with paving as per detail drawings, approved sample all complete and as directed by the Architect/ Engineer-in-Charge	each	13.00	**5500.00**	71500.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		R.C.C. PIPE LINE -				
28	19.6	Providing and laying non-pressure NP2 class (light duty) R.C.C. pipes with collars jointed with stiff mixture of cement mortar in the proportion of 1:2 (1 cement : 2 fine sand) including testing of joints etc. complete :				
a	19.6.2	150 mm	meter	12.00	**254.50**	3054.00
b	19.6.3	250 mm	meter	2704.00	**342.45**	925984.80
c	19.6.4	300 mm	meter	463.00	**422.90**	195802.70
d	19.6.6	450 mm	meter	15.00	**620.85**	9312.75
e	19.6.7	600 mm	meter	15.00	**1084.25**	16263.75
29	2.27	Supplying and filling in plinth with River sand / Murom under floors, including watering, ramming, consolidating and dressing complete.	cum	170.00	**749.30**	127381.00
		SEWER APPURTENANCES				
30	19.7	Constructing brick masonry manhole in cement mortar 1:4 (1 cement : 4 coarse sand) with R.C.C. top slab with 1:2:4 mix (1 cement : 2coarse sand : 4 graded stone aggregate 20 mm nominal size), foundation concrete 1:4:8 mix (1 cement : 4 coarse sand : 8 graded stone aggregate 40mm nominal size), inside plastering 12mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished with floating coat of neat cement and making channels in cement concrete 1:2:4 (1 cement : 2 coarse sand : 4 graded stone aggregate 20mm nominal size) finished with a floating coat of neat cement complete as per standard design :				
	19.7.2	Inside size 120x90 cm and 90 cm deep including C.I. cover with frame (medium duty) 500 mm internal diameter, total weight of cover and frame to be not less than 116 kg (weight of cover 58 kg and weight of frame 58 kg) :				
a	19.7.2.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	Each	92.00	**15322.95**	1409711.40

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	19.19	Providing and fixing in position pre-cast R.C.C. manhole cover and frame of required shape and approved quality				
	19.19.3	H D - 20				
	19.19.3.1	Circular shape 560 mm internal diameter (Less Diffrence Of C.I.& RCC cover with frame)	each	92.00	1390.25 -4290.64	-394738.88
c	19.8	Extra for depth for manholes				
	19.8.2	120 x 90 cm size manhole over item above.				
	19.8.2.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	Per meter	64.00	4866.75	311472.00
d	19.15	Providing M.S. foot rests including fixing in manholes with 20x20x10 cm cement concrete blocks 1:3:6 (1 cement : 3 coarse sand : 6 graded stone aggregate 20 mm nominal size) as per standard design :				
	19.15.2	With 20 mm diameter round bar	Each	412.00	193.15	79577.80
31	19.34	Providing and fixing S.W. intercepting trap in manholes with stiff mixture of cement mortar 1:1 (1 cement : 1 fine sand) including testing of joints etc. complete :				
	19.34.2	150 mm dia	each	17.00	337.70	5740.90
32	19.3	Constructing brick masonry chamber for underground C.I. inspection chamber and bends with bricks in cement mortar 1:4 (1 cement : 4 coarse sand) C.I. cover with frame (light duty) 455x610 mm internal dimensions, total weight of cover with frame to be not less than 38 kg (weight of cover 23 kg and weight of frame 15 kg), R.C.C. top slab with 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20 mm nominal size) foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size), inside plastering 12 mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished smooth with a floating coat of neat cement on walls and bed concrete etc. complete as per standard design :				
a	19.30.1	Inside dimensions 455 x 610 mm and 45 cm deep for single pipe line:				
	19.30.1.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	each	116.00	3917.65	454447.40

DATTA AND DATTA ASSOCIATES EST. 1982

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	19.19	Providing and fixing in position pre-cast R.C.C. manhole cover and frame of required shape and approved quality				
	19.19.1	L D- 2.5				
	19.19.1	Rectangular shape 600x450mm internal dimensions (Less Diffrence Of C.I.& RCC cover with frame)	each	116.00	-940.80	-109132.80
c	19.31	Extra for depth beyond 45 cm of brick masonry chamber :				
	19.31.1	For 455 x 610 mm size				
	19.31.1.1	With F.P.S. bricks	metre	62.00	2824.45	175115.90
33	19.21	Making connection of drain or sewer line with existing manhole including breaking into and making good the walls, floors with cement concrete 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size) cement plastered on both sides with cement mortar 1:3 (1 cement : 3 coarse sand) finished with a floating coat of neat cement and making necessary channels for the drain etc. complete :				
	19.21.2	For pipes 250 to 300 mm diameter	Each	17.00	333.15	5663.55
		VENTILATING COLUMN WORK				
34	ON SOR (D	Providing and erecting steel ventilating columns 15 cms. dia. with C.I. ornamental cap and base fixed firmly with necessary foundation with one coat of red lead oxide paint and one cost of any approved colour with 15 cms, dia. stoneware or R.C.C. pipe connection with M.H. including excavation with M.H. including excavation and jointing as required etc. complete. (As per drawing)	No.	1.00	16490.00	16490.00
		DUCTILE IRON PRESSURE PIPES (TYTON JOINTS) & FITTINGS				
35	18.72	Providing and laying S&S Centrifugally Cast (Spun) / Ductile Iron Pipes conforming to IS : 8329 :				
a	18.72.15	100 mm dia Ductile Iron Class K-9 pipes	meter	1363.00	946.00	1289398.00
b	18.72.16	150 mm dia Ductile Iron Class K-9 pipes	metre	10.00	1389.40	13894.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
c	18.72.17	200 mm dia Ductile Iron Class K-9 pipes	metre	10.00	**1895.40**	18954.00
36	18.73	Providing and laying Double Flanged (Screwed/ Welded) Centrifugally (Spun) Ductile Iron Pipes of Class K - 9 conforming to IS : 8329 :				
a	18.73.1	100 mm dia Ductile Iron Double Flanged	metre	14.00	**2376.45**	33270.30
b	18.73.2	150 mm dia Ductile Iron Double Flanged	metre	10.00	**3318.10**	33181.00
c	18.73.3	200 mm dia Ductile Iron Double Flanged	metre	10.00	**4395.00**	43950.00
		C.I. / D.I. STANDARD SPECIALS				
37	18.68	Providing and laying D.I. specials of class K-12 suitable for push-on jointing as per IS : 9523				
	18.68.1	Up to 600 mm dia	quintal	15.00	**13958.95**	209384.25
38	18.69	Providing and laying D.I. Specials of Class K - 12 suitable for mechanical jointing as per IS : 9523 :				
	18.69.1	Up to 600 mm dia	quintal	5.00	**14760.35**	73801.75
39	18.31	Providing and fixing C.I. sluice valves (with cap) complete with bolts, nuts, rubber insertions etc. (the tail pieces if required will be paid separately) :				
a	18.31.1	100 mm diameter				
	18.31.1.2	Class II	each	30.00	**3498.30**	104949.00
b	18.31.3	150 mm diameter				
	18.31.3.2	Class II	each	5.00	**5200.40**	26002.00
c	18.31.4	200 mm diameter				
	18.31.4.2	Class II	each	5.00	**11260.60**	56303.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
40	18.59	Providing and fixing C.I. double acting air valve of approved quality with bolts, nuts, rubber insertions etc. complete (The tail pieces, tapers etc if required will be paid separately) :				
a	18.59.1	50 mm dia	metre	17.00	**4018.15**	68308.55
b	18.59.2	80 mm dia	metre	4.00	**5830.10**	23320.40
c	18.59.3	100 mm dia	metre	6.00	**7602.35**	45614.10
41	18.6	Providing and fixing enclosed type water meter (bulk type) conforming to IS : 2373 and tested by Municipal Board complete with bolts, nuts, rubber insertions etc. (The tail pieces if required will be paid separately) :				
	18.60.2	100 mm dia nominal bore	each	6.00	**4329.20**	25975.20
		GALVANISED IRON PRESSURE PIPES & FITTINGS.				
42	18.12	Providing and fixing G.I. pipes complete with G.I. fittings including trenching and refilling etc.				
		External work				
a	18.12.3	25 mm dia. nominal bore	metre	43.00	**209.40**	9004.20
b	18.12.4	32 mm dia. nominal bore	metre	33.00	**248.55**	8202.15
c	18.12.5	40 mm dia. nominal bore	metre	33.00	**294.20**	9708.60
d	18.12.6	50 mm dia. nominal bore	metre	147.00	**355.95**	52324.65
e	18.12.7	65 mm dia. nominal bore	metre	2500.00	**453.55**	1133875.00
f	18.12.8	80 mm dia. nominal bore	metre	10.00	**573.40**	5734.00
43	18.13	Making connection of G.I. distribution branch with G.I. main of following sizes by providing and fixing tee, including cutting and threading the pipe etc. complete :				
a	18.13.1	25 to 40 mm nominal bore	each	6.00	**277.35**	1664.10

113

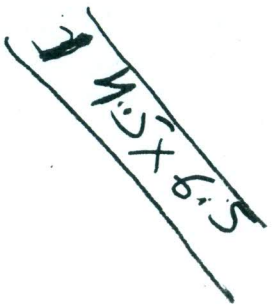
ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
b	18.13.2	50 to 80 mm nominal bore	each	17.00	630.15	10712.55
44	18.14	Fixing water meter and stop cock in G.I. pipe line including cutting and threading the pipe and making long screws etc. complete (cost of water meter and stop cock to be paid separately).	each	17.00	228.55	3885.35
45	18.17	Providing and fixing gun metal gate valve with C.I. wheel of approved quality (screwed end) :				
a	18.17.1	25 mm nominal bore	each	6.00	372.95	2237.70
b	18.17.2	32 mm nominal bore.	each	6.00	450.90	2705.40
c	18.17.3	40 mm nominal bore	each	6.00	546.05	3276.30
d	18.17.4	50 mm nominal bore	each	17.00	780.60	13270.20
e	18.17.5	65 mm nominal bore	each	6.00	1073.25	6439.50
f	18.17.6	80 mm nominal bore	each	5.00	1832.95	9164.75
		WATER APPURTENANCES				
46	18.33	Constructing masonry Chamber 60 x 60 x 75 cm inside, in brick work in cement mortar 1:4 (1 cement : 4 coarse sand) for sluice valve, with C.I. surface box 100mm. top diameter, 160 mm bottom diameter and 180 mm deep (inside) with chained lid and RCC top slab 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20mm nominal size) , i/c necessary excavation, foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) and inside plastering with cement mortar 1:3 (1 cement : 3 coarse sand) 12 mm thick finished with a floating coat of neat cement complete as per standard design :				
	18.33.1	With common burnt clay F.P.S.(non modular) bricks of class designation 7.5.	Each	17.00	5392.80	91679.30

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
47	18.34	Constructing masonry Chamber 90 x 90 x 100 cm inside, in brick work in cement mortar 1:4 (1 cement : 4 coarse sand) for sluice valve, with C.I. surface box 100 mm. top diameter, 160 mm bottom diameter and 180 mm deep (inside) with chained lid and RCC top slab 1:2:4 mix (1 cement : 2 coarse sand : 4 graded stone aggregate 20 mm nominal size), i/c necessary excavation, foundation concrete 1:5:10 (1 cement : 5 fine sand:10 graded stone aggregate 40 mm nominal size) and inside plastering with cement mortar 1:3 (1 cement : 3 coarse sand) 12 mm thick finished with a floating coat of neat cement complete as per standard design :				
	18.34.1	With common burnt clay F.P.S.(non modular) bricks of class designation 7.5.	each	30.00	**9277.10**	278313.00
		FIRE FIGHTING SYSTEM				
48	NS	Supplying & fixing 63 mm dia Gun metal branch pipe with 25 mm (nominal internal diameter) size Gun Metal nozzle conforming to IS 903, suitable for instantaneous connection to interconnect hose pipe coupling as required.	Nos	6.00	**1829.00**	10974.00
49		Providing and fixing following class-II Globe wheel valves, confirming to IS 778/1984 (Reaffirmed 2005), tested to 21.09 kg/sq.cmt.				
		Screwed				
		25mm dia	Nos	6.00	**252.00**	1512.00
50		Providing and fixing gunmetal Singel headed Yard hydrant valve conforming to IS - 5290 with 63 mm dia instantaneous female coupling on the outlet with S.S. orifice flange 6 mm thick as required to maintain 3.5 Kg/sq.cm., gunmetal blank cap and chain, necessary companion flanges (as per table "E") nuts, bolts, washer and gasket complete as per specification. (ISI marked)				
		Single outlet	Each	6.00	**4752.00**	28512.00
51	NS	Supplying and fixing 63mm dia, 15 mtr. Long RRL hose pipe with 63mm dia Male and Female Gun metal couplings duly banded with GI wire, rivets etc. conforming to IS 636 (type-A) as required.	Nos	6.00	**2040.00**	12240.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
52	NS	Supplying and Fixing Fire Hose Reel, wall mounting swinging type complete with drum & bracket of MS construction, spray painted in Post office Red, confirming to IS 884/1995 with upto date amendments, complete with the following as required.				
	a)	36 Meter long 20 mm dia water hose Thermoplastic (Textile reinforced) Type - 2 as per IS : 12585				
	b)	20 mm dia gun metal ball valve & nozzle.				
	c)	Drum and brackets for fixing the equimpments on wall.				
	d)	Connection from riser with stop valve (gun metal) & M.S. Pipe	Nos	6.00	**7260.00**	43560.00
53	NS	Providing and fixing Fire hose cabinet with glazed door shutter and frame with hold fasts (frame fabricated from 40 x 40 x 5mm and shutter from angle) 2100 mm high x 1200 mm wide x 600mm deep with locking arrangement, 4mm thick glass with M.S. flats including all accessories, painting with one coat of steel primer and two coats of postal red enamel paint complete as per drawing and as directed. The words " hose cabinet" to be painted on the box complete in all respects. (For Internal Hydrants)	Each	6.00	**7980.00**	47880.00
		DWC PIPE FOR STREET LIGHT CABLE -				
54	NS	Providing and laying Double walled corrugated (DWC) HDPE pipes conforming to IS : 14930, Part II in all kinds of strata. This includes jointing of pipes & fittings, trenching ,refilling etc. complete as per direction of Engineer in Charge.				
	a	63 mm/50 mm dia pipe	metre	180.00	**166.00**	29880.00
	b	110 mm/95 mm dia pipe	metre	2910.00	**322.00**	937020.00
	c	180 mm/152 mm dia pipe	metre	50.00	**599.00**	29950.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
		RAINWATER HARVESTING				
55		Constructing brick masonry Filter chamber for underground with part bricks masonary in cement mortar 1:4 (1 cement : 4 coarse sand) and Hunney comb masonary R.C.C. top slab with 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20 mm nominal size) foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) below masomary, inside part plastering 12 mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished smooth with a floating coat of neat cement on walls and bed concrete etc. complete as per standard designas and as per detail drawings all complete and as directed by the Architect/ Engineer-in-Charge.				
		Inside size @ 180 x 420 cm and 200 cm deep.	Each	4.00	**50000.00**	200000.00
56		Constructing Percolating Well with brick masonry Filter chamber for underground with part bricks masonary in cement mortar 1:4 (1 cement : 4 coarse sand) and Hunney comb masonary R.C.C. top slab with 1:2:4 mix (1 cement :2 coarse sand : 4 graded stone aggregate 20 mm nominal size) foundation concrete 1:5:10 (1 cement : 5 fine sand : 10 graded stone aggregate 40 mm nominal size) below masomary, inside part plastering 12 mm thick with cement mortar 1:3 (1 cement : 3 coarse sand) finished smooth with a floating coat of neat cement on walls and bed concrete etc. complete and Including Bore well of required dia for casing / strainer pipe, by suitable method prescribed in IS: 2800 (part I), including collecting samples from different strata, preparing and submitting strata chart/bore log, including hire & running charges of all equipments, tools, plants & machineries required for the job, all complete as per direction of Engineer –in-charge, upto 50 metre depth below ground level. as per standard designas and as per detail drawings all complete and as directed by the Architect/ Engineer-in-Charge,				
		Inside size @ 2.5 mt dia 3 deep filter Chamber. And 15 dia PVC Percolating Well of @ 50 mt Depth	Each	5.00	**140000.00**	700000.00

ABSTRACT - (BOQ)		PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				
ITEM No	DSR ITEM CODE	ITEM DESCRIPTION	UNIT	TOTAL QTY	RATE	AMOUNTS
57	6.34	Brick work with non modular fly ash lime bricks (FALG Bricks) conforming to IS:12894-2002, class designation 10 average compressive strength in super structure above plinth level up to floor V level in :				
	6.34.2	Cement mortar 1:6 (1 cement : 6 Coarse sand)	cum	360.00	**3978.50**	1432260.00
		TOTAL COST OF ALL INFRA. - PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				**29333247**
	I	**ADD CESS -- @**	**1.00**	%		293332
	II	**ADD CONNEGANCY -- @**	**3.00**	%		879997
	III	**ADD ARTC. FEES -- @**	**5.06**	%		1483148
		TOTAL COST OF ALL INFRA. - PROVIDING AND LAYING, FOOTHPATH, SEWERAGE, WATER SUPPLY LINES, STORM WATER DRAIN & CABLE DUCTING ALONG RING ROAD.				**31989725**



FC/2013:01:05	**Proposal for the Revised Detailed Project Report (DPR) of the Institute to be submitted to Govt. of India.** The Institute plans to expand its undergraduate, post graduate and research programmes in certain identified areas relevant to Design and Manufacturing. The proposed Revised DPR mentioned **from Page No. 125 to 139**. The Committee is requested to consider the proposal and recommend the Revised DPR to the BOG for approval.

PDPM

Indian Institute of Information Technology, Design & Manufacturing Jabalpur

Revised Detailed Project Report – 2013

1. Preamble

The last two decades have witnessed a revolution in almost every field that affects human life. Industrial practices, business and above all, the society have become more diverse and globally interrelated as never before. India, which is emerging as a knowledge-based economy, has been focusing on strengthening its education, healthcare and manufacturing sector apart from other priority areas. The modern manufacturing environment entails a large variety of cross-disciplinary activities including Design, IT and ITES (IT enabled services). Obviously, these elements need to find their ways into the engineering curricula and research at educational institutions. Further, the IT/ICT/ITES driven world demands that innovations be made in teaching and learning methods, especially in engineering education. In order to integrate the cross disciplinary knowledge that would facilitate and promote the competitive advantage of Indian manufacturing in the global market, the Ministry of Human Resource Development (MHRD), Government of India, set up PDPM IIITDM Jabalpur in 2005, exclusively for imparting education in IT enabled Design and Manufacturing.

Since its inception, PDPM IIITDM Jabalpur has been playing a vital role in producing quality human resources to contribute in India's mission of inclusive and sustainable growth. The Institute aims to set the standards in education and research in IT enabled Design and Manufacturing and produce competent and skilled manpower truly adept in these areas. Students are provided with the maximal opportunity to think innovatively for creating solutions to various problems of common concern. The truly interdisciplinary nature of the programme helps students and faculty think beyond traditional disciplinary boundaries.

Hence, working across disciplines is the core component of our approach to education and research activities.

In the recent technology-driven developments and greater global competitiveness, innovations have played a key role. Especially, some of the major innovations in the last decade have transformed the ways of communication and networking and have resulted in improving the quality of life of people throughout the globe. Realizing the importance of innovative methods, professionals and academics have started including components in the curricula that motivate students and professionals to think innovatively while designing products or systems. Technology and innovation complement each other in the development of a new product, process or a system. Needless to mention, Indian scenario requires a different approach to address the needs of a large and heterogeneous population. This throws a lot of challenges and opportunities for people and professionals to develop innovative systems for Indian masses and other neighbouring countries. **Keeping this in mind, the Institute has evolved this revised detailed plan report (DPR) with the vision to become a catalyst in transforming the quality of life of people of India and other developing countries having similar culture and background.**

The Institute is envisaged to become an academic leader in bringing together best creative minds from educational and research institutions and Innovative people from industry for the development of next generation technologies and practices towards the inclusive growth of Indian Manufacturing Industry and its globalization.

The Institute plans to expand its educational programmes that will have a long term impact on India's mission of strengthening its higher and technical education programmes in prioritized areas. These programmes would be directly or indirectly linked with design and manufacturing theme of the Institute and are envisaged to have greater role in the society and industry for Indian and similar population of developing countries. We plan to be a center of excellence on research and development in manufacturing technologies with primary focus on green technologies, health care, agriculture and secure systems. The Institute also plans to increase its intake to provide access to quality education to a larger number of aspiring young minds. With these two plans, a revised detailed project report is prepared and presented below.

2. Brief Profile of the Institute

Pandit Dwarka Prasad Mishra Indian Institute of Information Technology, Design & Manufacturing (PDPM IIITDM) Jabalpur was established in the year 2005 at Jabalpur, Madhya Pradesh by the Ministry of Human Resource Development, Department of Higher Education in the year 2005. The Institute was started under the Indian Societies Registration Act.

The Institute was set up to meet the requirements of education at national level in the fields of Information Technology, Design and Manufacturing. The motto of the Institute is to promote excellence through education and research in the desired areas of specialization to facilitate the competitive advantage of Indian products and manufacturing in the global markets. The Institute is orienting its R&D activities to promote translational research for bringing ideas from mind to market. The Institute has emerging research groups of engineers, designers, students and scholars to address the societal challenges and provide solutions that are sustainable, environmental friendly and also user centric.

2.1 Vision

"PDPM Indian Institute of Information Technology, Design and Manufacturing (IIITDM) Jabalpur shall be a Global Knowledge Hub for promoting excellence through education and research in IT enabled Design and Manufacturing to facilitate the inclusive growth of Indian manufacturing industry."

The Institute shall provide academic leadership in producing competent and skilled manpower that would contribute in building the brands "Designed in India" and "Made in India".

2.2 Mission

To create an environment that provides maximal opportunities for intellectual and creative development and commercial opportunities to build sustainable partnership between academics and industry.

The **Charter** of the PDPM IIIT DM Jabalpur is summarized below:

- To provide education and training, at both undergraduate and postgraduate levels, to persons of outstanding abilities who would provide leadership to Indian industry in globally competitive economic environment.
- To carry out advanced research and development activities in design and manufacturing technologies, both on its own and on sponsorship basis for the industry.
- To provide distance learning and continuing education programmes for faculty / students from other institutions and industry personnel.
- To facilitate interdisciplinary design-focused education, mind to market research and entrepreneurial activities;
- To act as a hub for a meaningful collaboration and networking between academic partner institutions, professionals and industry in a hub and spoke model.
- To organize conferences, seminars, workshops and such other activities for the dissemination of knowledge to industry.

2.3 Values

Besides continuing its ongoing activities, the Institute seeks to act in a manner that is guided by a deep-rooted sense of shared values and aspirations for its future planning. Working under such a sound frame of reference, the Institute:

a. Seeks to establish and maintain an environment enabling academic community to take intellectual and creative risks and to embrace changes that will lead to the technological innovations and development in future years.

b. Encourages, recognizes and rewards high performance in learning, teaching, scholarship, research and other creative activities by promoting intellectual curiosity and protecting the basic principles of academic freedom.

c. Provides an environment that imbibes respect for nature and environment, culture and human values.

d. Aspires to build an environment of tolerance and reasoned debate without any gender, caste, religious, regional or cross country bias by affirming the worth and personal dignity of every constituent member of the Institute and by contributing to a campus climate of civility.

2.4 Academic Programmes

In July-August 2005, the Institute began its academic work with the admission of the first batch of B.Tech. students in the following disciplines (i) Computer Science & Engineering (ii) Electronics & Communication Engineering and (iii) Mechanical Engineering.

Presently, the Institute runs the following programmes.

- **B. Tech., M. Tech. and Ph.D. programmes** in Computer Science & Engineering, Electronics & Communication Engineering, Mechanical Engineering
- **M. Tech.** in Mechatronics
- **Master of Design** and **Ph.D. programme** in **Design**

PDPM IIITDM Jabalpur is strengthening its academic activities by -

- Encouraging open-ended problem solving and independent study;
- Encouraging cross-disciplinary courses;
- Increasing the flexibility of programmes, and decreasing the number of courses required;
- Evolving a policy for web-based education as a supplement to classroom education.

2.5 Faculty and Research

Core of the knowledge community of the Institute comprises faculty members drawn from institutions of eminence from India and abroad who strive to excel in research, teaching and institution building. These members are working in a variety of areas in engineering, sciences, design, management and humanities. Existing faculty strength is 36 against the sanctioned strength of 55. In addition, the Institute has a group of seven research engineers who also contribute in development of labs, practical sessions, mentoring of students in design and other research projects. Further, the Institute invites academics and experts from industries to enrich the trans-disciplinary nature of the faculty at the Institute. Several eminent scholars from the country and Japan keep on visiting the Institute and contributing in the teaching programmes of the Institute. Due to the dedicated efforts and motivation of the faculty, the Institute has developed state of the art research facilities in some of the important areas to provide quality training to the post graduate and research students. Following research groups have been actively engaged in research and development.

- Intelligent Product Design
- Advanced Manufacturing
- Computer Graphics and Vision
- Computational Engineering
- Mechatronics and Robotics
- Communication Devices and Systems
- VLSI Design and Testing
- Image and Signal Processing
- Nano material and technology

Research works of faculty has been recognized at national and international level. Many of the faculty members brought laurels to the Institute in the form of research awards, membership of Board of Governors, serving as editors in international journals, presenting their research contribution in national and international conferences and publications in journals of high repute. In addition, some consultancy projects have also been undertaken by the faculty of the Institute.

2.6 Students Strength

Total Current strength of students is 1041 with the student intake given in Table 1-A and 1-B.

Table 1-A	
Total Present Strength of Students	
Programme	**Students Strength**
Undergraduate	878
Masters	101
Ph.D.	62
Total	1041
Table 1-B	
Current Intake (2012-13)	
Courses	**Per year student intake**
B Tech (CSE+ECE+ME)	261 (3 × 87)
M Tech (CSE+ECE+ME + MECHATRONICS)	60
M Des	15
PhD (CSE+ECE+ME + DESIGN)	55(3 ×15 + 10)

3. Academic Roadmap

Academic programmes define the philosophy of an educational institution. PDPM IIIT DM Jabalpur gives emphasis on synthesis, creativity, hands-on experience, innovation, communication and entrepreneurship. These qualities along with basic knowledge of design and manufacturing technologies form the ethos of education at the Institute. In order to ensure that the graduates are able to get suitable opportunities of employment in the Indian industry, the Bachelor's degree is being awarded in the conventional disciplines. However, the academic programmes have more emphasis on creative design and manufacturing training. The Master's programmes are aimed at providing opportunities to excel in various engineering domains with emphasis on design/manufacturing. The Institute plans to expand its postgraduate and research programmes so that students have more options of specializing in some basic tracts (or verticals) through courses and project work / thesis.

The Institute plans to build relationships with other Institutions of higher learning so that joint web based and online master's programmes could be launched for the benefit of larger section of postgraduate and undergraduate students in India and other countries. This would also help in addressing the growing concern of providing quality education to students across the country and to provide alternative solutions to the problem of shortage of quality teachers.

Looking at the acute shortage of quality faculty in engineering, the Institute also aims to increase the intake of Ph.D. Research activities of Ph.D. scholars will have will be supported through the faculty collaboration with leading academic institutions, research and development organizations and industry.

With the above objectives, a roadmap is planned to train manpower in the niche segment of 'IT enabled design and manufacturing' for generating knowledge capital for the country. Academics being the core of Institute, increase in the intake of students in various undergraduate, postgraduate and doctoral programmes and introduction of a few new programmes and specializations has been planned. This would require more infrastructure viz. classrooms, laboratories, research facilities, hostel accommodation, housing for faculty and staff, etc. Seats for various courses would be increased gradually over a period of six years which would increase the students' strength in the Institute.

The proposed increase in number of programmes and students intake in various programmes over a period of six years is detailed in Table 2-A. Number of students would be increased gradually as per the proposed distribution shown in the Table 2.

TABLE 2

	2013-14	2014-15	2015-16	2016-17	2017-18	2018-19
Students Intake						
UG	270	390	500	600	700	700
Master's	100	230	410	580	800	800
Doctoral	60	82	120	170	190	190
Total	430	702	1030	1350	1690	1690
Total Year Wise Strength (as per present strength)						
	1353	1704	2361	3200	4130	4700

Table 2-A

Details of Proposed Increase in the Students Intake and Introduction of New Programmes (2013-2019)

Year	Undergraduate Programme	Annual Intake in UG Programme	Master's Programme	Annual Intake in PG Programme	Doctoral Programme	Annual Intake in Doctoral Programme	Intake for the year	Total Intake M-Master D- Doctoral
2013-14	B.Tech CSE, ECE, ME 90 each	270	MTech - CSE, ECE, ME, Mechatronics, MDes: 20 each	100	CSE, ECE, ME: 15 each Des: 05 Natural Sciences (NS): 10	60	430	UG: 1053 PG(M): 175 PG(D): 125 **Total: 1353**
2014-15	B.Tech CSE, ECE, ME 120 each B. Des: 30	390	MTech – CSE (2 specializations -sp) ECE (3 sp) ME (3 sp), Mechatronics MDes MBA: 20 each MTech (Bio-Medical Engineering - BM): 10	230	CSE, ECE, ME: 20 each Des: 08 NS : 14	82	702	UG: 1182 PG(M): 330 PG(D): 192 **Total: 1704**
			CSE: Software Engineering, System Security **ECE**: VLSI, Communication Engineering, Embedded System, Power and Control **ME**: CAD, Manufacturing Technology, Energy Systems					

Year	Undergraduate Programme	Annual Intake in UG Programme	Master's Programme	Annual Intake in PG Programme	Doctoral Programme	Annual Intake in Doctoral Programme	Intake for the year	Total Intake
2015-16	BTech CSE, ECE, ME 150 each BDes: 50	500	MTech CSE (2sp) ECE (4 sp) ME (4sp), Mechatronics MDes MBA: 30 each MTech(BM): 20	410	ECE, ME: 30 each CSE, NS, Des: 20 each	120	1030	UG: 1421 PG(M): 640 PG(D): 300 **Total: 2361**
2016-17	BTech CSE, ECE, ME: 175 each BDes: 75	600	CSE (3sp) 90 ECE, ME (4sp): 160 each, Mechatronics 40 MDes: 40 MBA*: 60 each MTech (BM): 30	580	ECE, ME: 40 each CSE, NS, Des: 30 each	170	1350	UG: 1760 PG(M): 990 PG(D): 450 **Total: 3200**
			* Sp: Technology Management, System Management, Information Management and Manufacturing Management					
2017-18	BTech CSE, ECE, ME 200 each BDes: 100	700	CSE: 150 ECE, ME: 200 each , Mechatronics, MDes: 50 each MBA*: 100 each MTech (BM): 50	800	ECE, ME: 50 each CSE, NS, Des: 30 each	190	1690	UG: 2190 PG(M): 1380 PG(D): 560 **Total: 4130**
2018-19	BTech CSE, ECE, ME 200 each BDes: 100	700	CSE: 150 ECE, ME: 200 each , Mechatronics, MDes: 50 each MBA*: 100 each MTech (BM): 50	800	ECE, ME: 50 each CSE, NS, Des: 30 each	190	1690	UG: 2500 PG(M): 1600 PG(D): 600 **Total: 4700**

The final strength of students is envisaged to be 5000 from the year 2019-2020. Introduction of new programmes and increase in the intake of students would require increase in faculty strength to cater to the students' needs. As number of students would increase to **5000** in next six years, number of faculty and staff is also proposed to be increased as follows –

Students	-	**5000**
Faculty	-	**417** (In the ratio of 1:12)
Non- Faculty	-	**458 (including officers)** (In the ratio of 1:1:1)

4. Industry Interface

After establishing Advanced Manufacturing Processes Laboratory and the Design capabilities at the Institute, interaction with the local and nearby industries has begun. The first meeting with the local Industrialists was held on November 25, 2010 at the Institute. A total of about 10 people participated in the interaction meeting. Faculty from IIITDMJ presented their capabilities and research interests which could help local industries with the available resources both in design and manufacturing areas. In continuation to the above discussions at IIITDMJ, an Industry-Interaction programme was organized by the local small scale industry chapter on February 22, 2011 in the RICHAII industrial area. During this meeting problems related to various industries (15 different industries and about 30 participants were present) were discussed. All the MSME entrepreneurs were invited to the campus and demonstration of facilities available with the Institute along with the strengths of the Individual faculty were showcased. Since their visit to IIITDMJ, work related to services and concept designs have started. Such works benefit them both in terms of technical as well as commercial values.

Jabalpur has been identified as an Electronics and IT industry cluster by the Government of Madhya Pradesh. In an effort to develop relations with the SME around Jabalpur, the students and faculty participated in a mega event of Jabalpur Chambers of Commerce held on February 24, 2013. It is planned to provide low cost, energy efficient solutions and product designs to small and medium scale entrepreneurs with target groups as rural and agricultural population in the beginning. The activities will further be strengthened with partnership with large size business houses.

5. Research – Labs and Equipment

The Institute aims to build its research groups and facilities with focus on the following in the next five years-

(i) Low Cost Products and Devices

(ii) Low Cost Biomedical Electronics

(iii) Secure Systems

(iv) Agricultural Implements

(v) Green Technology, Devices and Systems

Major focus is to strive towards excellence in design, fabrication and manufacturing of knowledge intensive products. Thus, to make significant advancements in the identified fields, facilities, equipment and research scholars are a necessity. It is envisaged that the major research activities would revolve around the three main centers in the Institute –

(i) Design Innovation Centre,

(ii) Manufacturing Innovation Centre

(iii) IIIT Hospital and Research Centre

The details of the lab that are planned to be located in these centres, along with budgetary projections is given below –

TABLE 3 - Summary of Equipment Requirement		
S.No.	**Head**	**Amount (Rs. in lakhs)**
A	**Equipment and Machinery for Design Innovation Centre**	
1.	Product Development Lab	450.00
2.	Communication Devices and Systems Lab	450.00
3.	Transportation and Mobility Design Lab	150.00
4.	Interaction Design Lab	150.00
5.	Virtual Reality Lab	500.00
6.	Smart Structures Lab	150.00
7.	Computer Vision, Graphics and Image Processing Lab	200.00
8.	Biometric Lab	100.00
9.	Energy System Design Lab	100.00
10.	Environmental Technology Development Lab	100.00
11.	Secure System Design Lab	430.00
12.	Microelectronic Device Design Lab	500.00
13.	Robotics and Automation Lab	500.00
14.	Peripherals and other supporting tools/equipment	100.00
	Sub Total(A)	**3880.00**
B	**Equipment and Machinery for Manufacturing Innovation Centre**	
1.	Additive Manufacturing Lab	500.00
2.	Advanced Manufacturing Lab	900.00
3.	Nano and Micro Scale Manufacturing Lab	900.00
4.	Green Manufacturing Lab	200.00
5.	Fault Diagnosis and Condition Monitoring Lab	200.00
6.	Industrial Robotics and Manufacturing Automation	500.00
7.	Low Cost Consumer Electronics Lab	500.00
8.	Material Design and Characterization Lab	500.00
	Sub Total(B)	**4200.00**
C	**Equipment and Machinery for IIIT Hospital and Research Centre**	
1.	Testing, Inspection and Characterization Lab	500.00
2.	Imaging Lab	500.00
3.	Bio-medical Aids	200.00
4.	Surgical Aids	300.00

	Sub Total(C)	**1500.00**
D	**Miscellaneous**	
1.	Equipment Maintenance @10%	958.00
2.	Overheads and Contingencies in construction	387.00
	Sub Total(D)	**1345.00**
	Grand Total (A+B+C+D)	**10925.00**

6. Infrastructure

As elucidated above, with the number of courses, students and research programmes gradually increasing over a period of time, infrastructure facilities will also be required to grow accordingly. Some of the civil infrastructure projections are:

A. Academic and Administrative buildings (details at Table 4)

(a) Lecture Hall cum Tutorial Complex
(b) Administrative Block
(c) Library-cum-Computer Centre
(d) Design Innovation Centre
(e) Manufacturing Innovation Centre
(f) IIIT Hospital and Research Centre
(g) Primary Health Centre
(h) Service Network
(i) Student Activity Centre
(j) Professional Lab Complex
(k) Technology Innovation Centre
(l) Multi-Utility Centre

B. Hostel buildings

To provide accommodation to students, new hostels, mess and dining facilities are required, details of which are presented at Table 4.

S.No.	Name of Hostel	Capacity (in number of students)
(a)	Hall of Residence 2 (Single Seater)	800
(b)	Hall of Residence 5 (combination of single and triple seater)	1500
(c)	Hall of Residence 7 (Post Graduate student Hostel)	500
(d)	Hall of Residence 8 (Girls Hostel)	800
(e)	Mess and Dining Hall - 2	2100

C. Faculty and Non-Faculty Housing (details at Table 4)

In addition to students accommodation, additional residential units for faculty members and non-faculty members are required. It is planned to keep a provision of accommodation for 95 % of the faculty and 70 % of the staff working for the Institute in the long term plan. For this, provisions have been made in the detailed layout plan of the Institute campus. However, the projections for faculty and non-faculty housing for the next five years are given below.

Narmada Residency-II - 55 apartments (under construction)
(2 Bedroom apartments for faculty and Officers)
Narmada Residency –III- 160 apartments (60 under construction)
(3 Bedroom apartments for faculty and Officers)
Rewa II-A and Rewa II-B - 200 apartments (72 under construction)
(2 Bedroom apartments for Staff)
Semi-Detached Duplexes - 40 units

Further, the construction of a Visitor Hostel (guest house) has been started and around 36 rooms are being constructed. In future, another 60 rooms are planned to be added to it.

Building and infrastructure part of expected capital expenditure is summarized in Table 4 with further details provided in Table 4.1 and 4.2.

TABLE 4 - Summary of Building and Infrastructure – Requirement		
Item	**Head**	**Expected Expenditure FY 2013-14 to 2017-18 (Rs. in lakhs)**
Table 5.1	Work in Progress	28116.51
Table 5.2	Future Provisions	39772.53
		67889.04

Table 4.1 Infrastructure Works in Progress

S. No.	Name of building /work	Area in Sqm.	Rate Per Sqm (in Rs.)	Cost in lakhs.
1.	Lecture Hall and Tutorial Complex	10555.0	35360	3731.94
2.	Administrative Block	4850.00	30000	1454.14
3.	Primary Health Centre	1532.00	32300	495.20
4.	Service Network	----	----	3993.00
5.	Student Activity Centre	----	---	2600.00
6.	Professional Lab Complex	10500.00	45000	4725.00
7.	Technology Innovation Centre	3307.00	54200	1790.73

8.	Multi Utility Centre	2981.00	35300	1055.09
9.	Library Cum Computer Center	6120.00	38553	2359.47
10.	Mess and Dining Hall existing for 2000 capacity	3543.00	17700	628.41
11.	Visitor's Hostel (Guest House)	3950.00	30000	1185.22
12.	Hall of Residence 7 (PG Hostel)	15635.00	23000	3606.00
13.	Hall of Residence 8 (Girls Hostel)	6406.00	23600	1512.06
14.	Narmada Residency- II (NR-II)	8197.00	18500	1514.61
15.	Narmada Residency- III (NR-III)	13212.00	18500	2448.85
16.	Rewa Residency 2 A	6550.00	22000	1440.00
17.	02 Nos. Type V Quarters			73.00
Grand Total for Sanctioned Projects (Rs. In Lakhs)				**34367.45**
Grant already received for above sanctioned projects (Rs. In Lakhs)				**6250.94**
Remaining Grant required for sanctioned projects (Rs. In Lakhs)				**28116.51**
**** Buildings of value Rs. 6800.00 (lakhs) have completed and are functional.***				

Table 4.2 Future Provisions for Infrastructure in F.Y. 2013-14 to 2017-18

S.No	Name of building /work	Area in Sqm.	Rate Per Sqm (in Rs.)	Cost in lakhs.	Add for possible cost enhancement Lakhs	Add for furnishing Lakhs	Total for Future Provisions Lakhs
1.	Design Innovation Centre	3500.00	45000	1575.00	157.50	157.50	1890.00
2.	Manufacturing Innovation Centre	3576.00	45000	1609.20	160.92	160.92	1931.04
3.	Service Network			2000.00	200.00	--	2200.00
4.	Mess and Dining Hall existing for 2000 capacity Future for 2100 capacity	4148.00	30000	1244.40	124.44	124.44	1493.28
5.	Hall of Residence- 2	21716.00	30000	6514.80	651.48	651.48	7817.76
6.	Hall of Residence - 5	35837.00	30000	10751.00	1075.10	1075.10	12902.00
7.	Narmada Residency- III (NR-III) 100 unit	18520.00	30000	5556.00	555.60		6111.60
8.	Rewa Residency 2 A 128 unit	11645.00	30000	3493.50	349.35		3842.85
9.	Semi Detached House 40 units	4800.00	30000	1440.00	144.00		1584.00
Total Budget requirement for future projects:							**39772.53**

7. Financial Projections

Summary of the consolidated financial projections for next five years, i.e., for the year 2013-14 to the year 2017-18 is given below.

Table 5- SUMMARY OF FINANCIAL PROJECTIONS Rs in Lakhs	
5.1 FINANCIAL PROJECTIONS FY 2013-14 TO 2017-18	
RECURRING	18500.00
NON-RECURRING	78814.04
TOTAL (A)	**97314.04**
5.2 EXPENDITURE INCURRED* From FY 2005-06 to 2012-13	
RECURRING	6223.74
NON-RECURRING	18289.97
TOTAL (B)	**24513.71**
* The table also contains the committed expenditure for the FY 2012-13 also.	
Total Project Cost Estimate (A + B) – 121827.75	

Table 6- SUMMARY OF FINANCIAL PROJECTIONS-YEARWISE BREAKUP

Major Head	Year wise Financial Projections (Rs. In lakhs)					
	Year 2013-14	**Year 2014-15**	**Year 2015-16**	**Year 2016-17**	**Year 2017-18**	**Total**
(A) Capital expenditure						
Building and Infrastructure	22000.00	18000.00	12000.00	10000.00	5889.04	67889.04
Equipment	1500.00	2500.00	3000.00	3000.00	925.00	10925.00
Total (Year wise)	23500.00	20500.00	15000.00	13000.00	6814.04	**78814.04**
(B) Recurring Expenditure						
Salary	700.00	1000.00	1400.00	1900.00	2500.00	7500.00
General Expenditure	1200.00	1600.00	2100.00	2700.00	3400.00	11000.00
Total (Year wise)	1900.00	2600.00	3500.00	4600.00	5900.00	**18500.00**
Grand Total (A+B) Year wise	***25400.00***	***23100.00***	***18500.00***	***17600.00***	***12714.04***	***97314.04***

FC/2013:01:06	**To consider the Budget for the F.Y. 2012-13(Revised Estimates) and F.Y. 2013-14(Budget Estimates). The Summary of the proposed Budget is given below :-**

Revised Budget Estimate For the F.Y. 2012-13 (Rs. In lakhs)

	Salary Head(36)	General Expenditure	Capital Exp	Total
O/B	0.00	0.00	1529.58	1529.58
Grant Sanctioned	612.00	738.00	3150.00	4500.00
RE Proposed (12-13)	537.58	1188.00	6739.00	8464.58
(Exp till 10/2/13	482.27	823.96	3226.51	4532.74
BE Proposal(13-14)	819.95	1553.00	14461.00	16833.95

A detailed budget estimate is enclosed **from Page No. 141 to 161.**

The Committee is requested to consider the proposal for recommendations to the BOG.

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR		
PROPOSAL FOR PLAN BUDGET REVISED ESTIMATES (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14		
INDEX		
S.N.		Page No.
1	Budget Summary 2012-13	1
2	Budget Summary 2013-14	2
3	Head 36 (Salaries)	3
4	Head 31 (General Expenditure)	4-7
5	Head 35 (Capital Expenditure)	8-14
6	Minor Civil Works	15
7	Head 35 Summary	16
8	Deposits with CPWD	17

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR(MP)

PROPOSAL FOR PLAN BUDGET REVISED ESTIMATES (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14

BUDGET SUMMARY 2012-13

	Object head 36 (Salaries)	Object head 31 (General Expenditure)	Object head 35 (Capital Expenditure)	TOTAL
Opening balance as on 01.04.2012	0.00	0.00	1529.58	1529.58*
Grant sanctioned from MHRD, GOI	612.00	738.00	3150.00	4500.00
Revised estimates for FY 2012-13	537.58	1188.00	6739.00	8464.58
***Grant of 1500 lakhs of F.Y. 2011-12 received on 04 April 2012-13 under Object Head 35.**				
Expenditure up to 10.02.2013	482.27	823.96	3226.51	4532.74

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR

PROPOSAL FOR PLAN BUDGET REVISED ESTIMATES (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14

BUDGET SUMMARY 2013-14

	Object head 36 (Salaries)	Object head 31 (General Expenditure)	Object head 35 (Capital Expenditure)	TOTAL
Opening balance	*	*	*	*
Grant sanctioned from MHRD	*	*	*	*
Budget Estimates for FY 2013-14	819.95	1553.00	14461.00	16833.95
Total requirements	819.95	1553.00	14461.00	16833.95

NAME OF INSTITUTE: PDPM- IIITDM, JABALPUR

PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE (B.E.) FOR F.Y. 2013-14

OBJECT HEAD-36 GRANT-IN-AID-GENERAL (SALARIES)								**Rs. In lakhs**	
Sl. No.	Budget Head	Actuals 2010-11	Actuals 2011-12	Actual Exp as on 10th February 2013	Approved Budget Estimates F.Y. 2012-13	Proposed (Revised Estimates) F.Y. 2012-13	Proposed (Budget Estimates) F.Y. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
A.	**PART-'A' SALARIES**								
1	Faculty	281.26	316.63	345.34	631.78	383.17	602.81	No increase in Revised Budget	As per sanctioned posts
2	Non-Faculty	105.63	135.27	136.93	275.00	154.41	217.14	No increase in Revised Budget	As per sanctioned posts
TOTAL- 'A'		**386.89**	**451.90**	**482.27**	**906.78**	**537.58**	**819.95**		

NAME OF INSTITUTE: PDPM- IIITDM, JABALPUR

PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE (B.E.) FOR F.Y. 2013-14

OBJECT HEAD-31 GRANT-IN-AID-GENERAL (RECURRING EXPENSES)								**Rs. In lakhs**	
Sl. No.	Budget Head	Actuals 2010-11	Actuals 2011-12	Actual Exp as on 10th February 2013	Approved Budget Estimates F.Y. 2012-13	Proposed (Revised Estimates) F.Y. 2012-13	Proposed (Budget Estimates) F.Y. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
	ITEMS								
B.	PART-'B' OTHER COMPONENTS (These items shouldn't include in Salaries components)								
1	Leave Encashment	0.00	1.32	2.55	7.00	7.00	10.00	as per current requirements	as per future requirements
2	LTC	5.53	13.81	14.71	30.00	16.00	25.00	as per current requirements	as per future requirements
3	Retirement Benefits	0.00	0.25	3.35	3.00	4.00	4.00	as per current requirements	as per future requirements
4	Children Education Allowance	3.13	4.86	3.87	12.00	7.00	10.00	as per current requirements	as per future requirements
5	Contribution to New Pension Scheme	31.33	34.95	39.64	70.00	46.00	70.00	as per current requirements	as per future requirements
6	Professional Development Fund	19.35	36.57	25.56	70.00	35.00	60.00	as per current requirements	as per future requirements
7	Medical Treatment (Staff)	8.22	17.52	8.40	20.00	15.00	30.00	as per current requirements	as per future requirements
	TOTAL- 'B'	**67.56**	**109.28**	**98.08**	**212.00**	**130.00**	**209.00**		
C	**OTHERS**								

1	Manpower deployment (through Outsourcing) (including Security and Housekeeping staff)	101.08	153.05	176.29	210.00	240.00	270.00	as per current requirements	as per future requirements
2	Advertisement and Publicity	38.40	70.38	25.07	100.00	35.00	70.00	as per current requirements	as per future requirements
3	Consumables	17.04	16.92	16.96	22.00	20.00	30.00	as per current requirements	as per future requirements
4	Departmental Expenses	15.92	15.44	7.07	25.00	10.00	25.00	as per current requirements	as per future requirements
5	Electricity & Power	79.97	129.01	123.02	180.00	180.00	220.00	as per current requirements	as per future requirements
6	Students' Health Facility and Medical insurance	3.83	6.29	14.61	13.00	18.00	20.00	as per current requirements	as per future requirements
7	Honorarium	21.08	33.38	27.94	50.00	37.00	50.00	as per current requirements	as per future requirements
8	Membership/Workshop and Seminar Expenses	0.00	0.00	3.39	7.00	5.00	5.00	as per current requirements	as per future requirements
9	Horticulture Expenses	2.36	3.38	1.01	12.00	2.00	5.00	as per current requirements	as per future requirements
10	Hospitality Expenses	7.34	11.65	5.94	18.00	8.00	10.00	as per current requirements	as per future requirements
11	House Keeping Expenses	0.63	1.12	1.31	4.00	2.50	3.00	as per current requirements	as per future requirements

12	Guest House Rent & Maintenance	10.82	4.32	2.97	6.00	4.00	6.00	as per current requirements	as per future requirements
13	Bank Charges	1.05	5.63	0.10	4.00	4.00	5.00	as per current requirements	as per future requirements
14	News Papers and Periodicals	0.30	0.68	1.04	0.80	1.50	2.00	Due to increase in requirements	as per future requirements
15	Office & Misc Expenses	8.54	7.68	5.19	15.00	7.00	10.00	as per current requirements	as per future requirements
16	Postage and Courier Charges	1.27	1.29	1.10	3.00	2.00	3.00	as per current requirements	as per future requirements
17	Printing and Stationary	13.79	12.68	7.37	19.00	9.00	15.00	as per current requirements	as per future requirements
18	Professional Charges	8.46	6.29	20.56	12.00	20.00	30.00	as per current requirements	as per future requirements
19	Repairs and Maintenance	6.16	16.12	5.73	20.00	8.00	15.00	as per current requirements	as per future requirements
20	Scholarship and Assistantship	63.74	128.84	151.44	110.00	240.00	280.00	as per current requirements	as per future requirements
21	Telephone Expenses	19.85	11.51	10.53	20.00	14.00	20.00	as per current requirements	as per future requirements
22	Internet and Lease line Expenses	18.75	69.43	42.72	90.00	80.00	100.00	as per current requirements	as per future requirements
23	Transport/Vehicle Hiring Expenses	26.53	15.80	15.54	20.00	25.00	30.00	as per current requirements	as per future requirements

24	Travelling and Conveyance (TA/DA etc)	32.38	45.49	28.73	80.00	45.00	60.00	as per current requirements	as per future requirements
25	Vehicle Running and Maintenance	0.00	10.95	7.86	15.00	10.00	15.00	as per current requirements	as per future requirements
26	Convocation Expenses	4.54	5.10	4.97	8.00	6.00	10.00	as per current requirements	as per future requirements
27	Students Support Services	7.85	30.94	17.42	35.00	25.00	35.00	as per current requirements	as per future requirements
TOTAL- 'C'		**511.68**	**813.37**	**725.88**	**1098.80**	**1058.00**	**1344.00**		
Total of Object Head-31 (Recurring Expenses)		**579.24**	**922.65**	**823.96**	**1310.80**	**1188.00**	**1553.00**		

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR

PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14

OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)										**Rs. In lakhs**
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
A.	CONSTRUCTION WORKS ASSIGNED TO CPWD									
1	Narmada Residency-II	1598.00	100.00	23.44	500.00	305.99	510.00	573.00	Slight enhancement	Provision for payment to CPWD
2	Narmada Residency-III	2563.00	24.56	209.23	700.00	507.30	805.00	1060.70	To be paid to CPWD	Provision for payment to CPWD
3	Lecture Hall & Tutorial Complex (LH&TC)	3731.94	600.37	17.22	1200.00	303.40	605.00	1711.94	To be paid to CPWD	Provision for payment to CPWD
4	Mess Dining Hall 1	628.00	14.09	0.00	426.20	2.21	2.21	426.20	Due to slow rate of work	Provision for payment to CPWD
5	Hall of Residence-4	2278.00	708.73	404.74	878.00	802.24	903.00	270.33	As per demand note of CPWD	
6	Security Barrack	74.91	21.66	45.46	9.45	0.00	0.00	0.00	Final adjustment awaited	

7	Visitor's Hostel	1185.22	358.45	5.64	300.00	5.62	255.62	565.51	Provision for payment to CPWD	Provision for payment to CPWD
8	Road Network(Phase-I)	255.00	50.00	0.00	155.00	0.00	100.00	105.00		Provision for payment to CPWD
9	Back side Boundary Wall at Nalah Portion	19.90	0.00	19.84	13.90	0.00	0.00	0.00	Final adjustment awaited	
10	External Sewerage System (Ph-1)	118.79	0.00	1.43	78.79	100.00	100.00	17.36		Provision for payment to CPWD
11	Library- Cum-Computer Centre	2359.47	0.00	478.52	1000.00	4.34	204.34	800.00	Due to slow rate of work	Provision for payment to CPWD
12	P.G. Hostel (Phase-I)	1237.00	0.00	358.91	300.00	0.00	0.00	350.00	Due to slow rate of work	Provision for payment to CPWD
13	Over Head Water Tank	41.17	0.00	30.00	31.17	10.00	21.17	0.00	Final adjustment awaited	
14	Basket ball Court (Indoor)	477.15	0.00	116.00	130.64	104.37	204.37	156.78	As per change in estimate of the work	Provision for payment to CPWD
15	Type-V Residential Quarters (2 Nos)	73.11	0.00	20.00	53.11	40.00	40.00	13.11		Provision for payment to CPWD

16	C.C. Road from Security Barracks to Hall-1	115.78	0.00	0.00	15.78	70.00	70.00	45.78		Provision for payment to CPWD
17	PG Hostel (Ph.II)	2369.00	0.00	0.00	800.00	168.40	408.40	800.00		Provision for payment to CPWD
18	Administrative Building	1379.15	0.00	0.00	500.00	11.25	150.00	600.00	As per demand note of CPWD	Provision for payment to CPWD
19	Student Activities Centre-I	1816.21	0.00	13.83	500.00	0.00	150.00	600.00		Provision for payment to CPWD
20	Hall of Residence -8 (Girls Hostel-I)	1512.06	0.00	11.52	400.00	0.00	150.00	500.00	As per demand note of CPWD	Provision for payment to CPWD
21	Rewa Residency-II (Staff Quarters)	1440.26	0.00	0.00	500.00	158.36	465.00	500.00	As per demand note of CPWD and architect fee	Provision for payment to CPWD
22	Health Centre	495.19	0.00	2.60	300.00	0.00	150.00	300.00	As per demand note of CPWD	Provision for payment to CPWD
23	RCC UG Sump Well	28.57	0.00	0.00	0.00	0.00	28.57	0.00	As per demand note of CPWD	Provision for payment to CPWD
24	Design Studio	6000.00	0.00	0.00	0.00	0.00	0.00	1000.00		Provision for payment to CPWD

25	Technological Incubation Centre	1790.73	0.00	0.00	0.00	0.00	0.00	567.00		Provision for payment to CPWD
26	Multi Utility Centre	1055.09	0.00	0.00	0.00	0.00	0.00	367.00		Provision for payment to CPWD
27	Road and service Network (Phase 2)	3000.00	0.00	0.00	0.00	0.00	100.00	900.00	Provision for payment to CPWD	Provision for payment to CPWD
28	Electrical Networking system (balance work)	732.26	0.00	0.00	0.00	0.00	100.00	632.26		
29	Box Culverts over Nalah zone A	61.05	0.00	0.00	0.00	1.37	25.00	34.68		Provision for payment to CPWD
30	Box Culverts over Nalah Zone B	61.05	0.00	0.00	0.00	1.37	25.00	34.68		
31	Footpath, sewerage line water supply line store water drains and cable ducting along ring road	319.90	0.00	0.00	0.00	0.00	100.00	219.90		
	Total	**38816.96**	**1877.86**	**1758.38**	**8792.04**	**2596.22**	**5672.68**	**13151.23**		
B	CONSTRUCTIONS WORKS DIRECTLY UNDERTAKEN BY INSTITUTE									
1	Hall of Residence 1 (SH:Civil & Electrical)	1473.00	75.38	152.76	0.00	0.00	0.00	0.00	Work completed	
2	Triple Seated Hall of Residence-1(SH : Civil & Electrical)	2155.00	911.74	208.52	0.00	269.41	269.41	0.00	Work completed	

3	Minor Civil Construction &Misc Works	0.00	130.40	113.82	210.00	75.55	110.00	100.00		
4	Misc. Electrical Works	0.00	4.70	3.53	25.00	9.86	10.00	25.00		
5	Power supply to Security Barrack from CSS-3	0.00	0.00	0.00	0.00	11.49	11.49	0.00	Final payment of the project	
6	Electrical Supply and Management System	0.00	0.00	0.00	0.00	61.11	61.11	0.00	To settle final payment	
7	DG Set	0.00	0.00	0.00	0.00	0.00	0.00	130.00		
8	Construction of Canteen 2	35.00	0.00	0.00	0.00	35.96	35.96	0.00	To settle final payment	
	Total	**3663.00**	**1122.22**	**478.63**	**235.00**	**463.38**	**497.97**	**255.00**		
C	FURNITURE & FIXTURES									
1	Furniture	0.00	70.88	37.43	200.00	36.71	70.00	250.00	As per the demands	Provision to meet future demands
	Total	**0.00**	**70.88**	**37.43**	**200.00**	**36.71**	**70.00**	**250.00**		
D	EQUIPMENTS									
1	Lab Equipment	0.00	104.56	115.73	300.00	60.23	140.00	350.00	As per the demands	Provision to meet future demands
2	Office & Misc. Equipment	0.00	71.43	17.14	100.00	14.75	20.00	50.00	As per the demands	Provision to meet future demands

3	Electrical Installation/Air conditioner	0.00	0.00	5.35	0.00	5.58	8.35	14.77	As per the demands	Provision for payment to meet future demands
	Total	**0.00**	**175.99**	**138.22**	**400.00**	**80.56**	**168.35**	**414.77**		
E	COMPUTERS & PERIPHERALS									
1	Computer Hardware & Networking	0.00	129.16	70.72	200.00	29.41	150.00	150.00	As per the demands	Provision to meet future demands
2	Computer Software	0.00	90.62	99.27	200.00	11.96	50.00	100.00	As per the demands	Provision to meet future demands
	Total	**0.00**	**219.78**	**169.99**	**400.00**	**41.37**	**200.00**	**250.00**		
F	LIBRARY BOOKS									
1	Books	0.00	6.19	8.67	50.00	4.50	6.00	15.00	As per the demands	Provision to meet future demands
2	Online Journals	0.00	0.00	90.03	110.00	3.77	124.00	125.00		
	Total	**0.00**	**6.19**	**98.70**	**160.00**	**8.27**	**130.00**	**140.00**		
TOTAL of Object Head - 35 (Capitalised Items)		**42479.96**	**3472.92**	**2681.35**	**10187.04**	**3226.51**	**6739.00**	**14461.00**		

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)								Rs. In lakhs		
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
A.	CONSTRUCTION WORKS ASSIGNED TO CPWD									
1	Narmada Residency-II	1598.00	100.00	23.44	500.00	305.99	510.00	573.00		Provision for payment to CPWD
2	Narmada Residency-III	2563.00	24.56	209.23	700.00	507.30	805.00	1060.70		Provision for payment to CPWD
3	Lecture Hall & Tutorial Complex (LH&TC)	3731.94	600.37	17.22	1200.00	303.40	605.00	1711.94		Provision for payment to CPWD
4	Mess Dining Hall 1	628.00	14.09	0.00	426.20	2.21	2.21	426.20	Due to slow rate of work	Provision for payment to CPWD
5	Hall of Residence-4	2278.00	708.73	404.74	878.00	802.24	903.00	270.33	As per demand note of CPWD	
6	Security Barrack	74.91	21.66	45.46	9.45	0.00	0.00	0.00	Final adjustment awaited	
7	Visitor's Hostel	1185.22	358.45	5.64	300.00	5.62	255.62	565.51	Provision for payment to CPWD	Provision for payment to CPWD
8	Road Network(Phase-I)	255.00	50.00	0.00	155.00	0.00	100.00	105.00		Provision for payment to CPWD

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)								Rs. In lakhs		
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
9	Back side Boundary Wall at Nalah Portion	19.90	0.00	19.84	13.90	0.00	0.00	0.00	Final adjustment awaited	
10	External Sewerage System (Ph-1)	118.79	0.00	1.43	78.79	100.00	100.00	17.36		Provision for payment to CPWD
11	Library- Cum- Computer Centre	2359.47	0.00	478.52	1000.00	4.34	204.34	800.00	Due to slow rate of work	Provision for payment to CPWD
12	P.G. Hostel (Phase-I)	1237.00	0.00	358.91	300.00	0.00	0.00	350.00	Due to slow rate of work	Provision for payment to CPWD
13	Over Head Water Tank	41.17	0.00	30.00	31.17	10.00	21.17	0.00	Final adjustment awaited	
14	Basket ball Court (Indoor)	477.15	0.00	116.00	130.64	104.37	204.37	156.78	As per change in estimate of the work	Provision for payment to CPWD
15	Type-V Residential Quarters (2 Nos)	73.11	0.00	20.00	53.11	40.00	40.00	13.11		Provision for payment to CPWD
16	C.C. Road from Security Barracks to Hall-1	115.78	0.00	0.00	15.78	70.00	70.00	45.78		Provision for payment to CPWD

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)									Rs. In lakhs	
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
17	PG Hostel (Ph.II)	2369.00	0.00	0.00	800.00	168.40	408.40	800.00		Provision for payment to CPWD
18	Aministrative Building	1379.15	0.00	0.00	500.00	11.25	150.00	600.00	As per demand note of CPWD	Provision for payment to CPWD
19	Student Activities Centre-I	1816.21	0.00	13.83	500.00	0.00	150.00	600.00		Provision for payment to CPWD
20	Hall of residence -8 (Girls Hostel-I)	1512.06	0.00	11.52	400.00	0.00	150.00	500.00	As per demand note of CPWD	Provision for payment to CPWD
21	Rewa Residency-II (Staff Quarters)	1440.26	0.00	0.00	500.00	158.36	465.00	500.00	As per demand note of CPWD and architect fee	Provision for payment to CPWD
22	Health Centre	495.19	0.00	2.60	300.00	0.00	150.00	300.00	As per demand note of CPWD	Provision for payment to CPWD
23	RCC UG Sump Well	28.57	0.00	0.00	0.00	0.00	28.57	0.00	As per demand note of CPWD	Provision for payment to CPWD
24	Design Studio	6000.00	0.00	0.00	0.00	0.00	0.00	1000.00		Provision for payment to CPWD

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)								Rs. In lakhs		
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
25	Technological Incubation Centre	1790.73	0.00	0.00	0.00	0.00	0.00	567.00		Provision for payment to CPWD
26	Multi Utility Centre	1055.09	0.00	0.00	0.00	0.00	0.00	367.00		Provision for payment to CPWD
27	Road and service Network (Phase 2)	3000.00	0.00	0.00	0.00	0.00	100.00	900.00	Provision for payment to CPWD	Provision for payment to CPWD
28	Electrical Networking system (balance work)	732.26	0.00	0.00	0.00	0.00	100.00	632.26		
29	Box Culverts over Nalah zone A	61.05	0.00	0.00	0.00	1.37	25.00	34.68		Provision for payment to CPWD
30	Box Culverts over Nalah Zone B	61.05	0.00	0.00	0.00	1.37	25.00	34.68		
31	Foothpath, sewrage line water supply line store water drains and cable ducting along ring road	319.90	0.00	0.00	0.00	0.00	100.00	219.90		
	Total	**38816.96**	**1877.86**	**1758.38**	**8792.04**	**2596.22**	**5672.68**	**13151.23**		
B	CONSTRUCTIONS WORKS DIRECTLY UNDERTAKEN BY INSTITUTE									
1	Hall of Residence 1 (SH:Civil & Electrical)	1473.00	75.38	152.76	0.00	0.00	0.00	0.00	Work completed	

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)								Rs. In lakhs		
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
2	Triple Seated Hall of Residence-1 (SH : Civil & Electrical)	2155.00	911.74	208.52	0.00	269.41	269.41	0.00	Work completed	
3	Minor Civil Construction & Misc Works	0.00	130.40	113.82	210.00	75.55	110.00	100.00		
4	Misc. Electrical Works	0.00	4.70	3.53	25.00	9.86	10.00	25.00		
5	Power supply to Security Barrack from CSS-3	0.00	0.00	0.00	0.00	11.49	11.49	0.00	Final payment of the project	
6	Electrical Supply and Management System	0.00	0.00	0.00	0.00	61.11	61.11	0.00	To settle final payment	
7	DG Set	0.00	0.00	0.00	0.00	0.00	0.00	130.00		
8	Construction of Canteen 2	35.00	0.00	0.00	0.00	35.96	35.96	0.00	To settle final payment	
	Total	**3663.00**	**1122.22**	**478.63**	**235.00**	**463.38**	**497.97**	**255.00**		
C	FURNITURE & FIXTURES									
1	Furniture	0.00	70.88	37.43	200.00	36.71	70.00	250.00	As per the demands	Provision to meet future demands
	Total	**0.00**	**70.88**	**37.43**	**200.00**	**36.71**	**70.00**	**250.00**		
D	EQUIPMENTS									

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR

PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14

OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS) Rs. In lakhs

Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
1	Lab Equipment	0.00	104.56	115.73	300.00	60.23	140.00	350.00	As per the demands	Provision to meet future demands
2	Office & Misc. Equipment	0.00	71.43	17.14	100.00	14.75	20.00	50.00	As per the demands	Provision to meet future demands
3	Electrical Installation/Air conditioner	0.00	0.00	5.35	0.00	5.58	8.35	14.77	As per the demands	Provision for payment to meet future demands
	Total	**0.00**	**175.99**	**138.22**	**400.00**	**80.56**	**168.35**	**414.77**		
E	COMPUTERS & PERIPHERALS									
1	Computer Hardware & Networking	0.00	129.16	70.72	200.00	29.41	150.00	150.00	As per the demands	Provision to meet future demands
2	Computer Software	0.00	90.62	99.27	200.00	11.96	50.00	100.00	As per the demands	Provision to meet future demands
	Total	**0.00**	**219.78**	**169.99**	**400.00**	**41.37**	**200.00**	**250.00**		
F	LIBRARY BOOKS									
1	Books	0.00	6.19	8.67	50.00	4.50	6.00	15.00	As per the demands	Provision to meet future demands
2	Online Journals	0.00	0.00	90.03	110.00	3.77	124.00	125.00		
	Total	**0.00**	**6.19**	**98.70**	**160.00**	**8.27**	**130.00**	**140.00**		

NAME OF THE INSTITUTE : PDPM- IIITDM, JABALPUR										
PROPOSAL FOR PLAN BUDGET (R.E.) FOR F.Y. 2012-13 AND BUDGET ESTIMATE(B.E.) F.Y.2013-14										
OBJECT HEAD-35 GRANT-IN-AID-GENERAL- NON RECURRING EXPENSES (FOR CAPITALISED ITEMS)									Rs. In lakhs	
Sl. No.	Account Head	AA & ES	Actual 2010-11	Actual Exp 2011-12	B.E.2012-13	Actual Expenditure as on 10 February 2013	Proposed R.E. 2012-13	B.E. 2013-14	Justification for RE 2012-13	Justification for BE 2013-14
	TOTAL of Object Head -35 (Capitalised Items)	**42479.96**	**3472.92**	**2681.35**	**10187.04**	**3226.51**	**6739.00**	**14461.00**		

FC/2013:01:07	**Any Other Item with permission of Chair** 2013/2nd meeting of the B&WC is scheduled to be held on 28-2-2013 to consider the proposals of construction of Professional Lab Complex and Electrical Work in the ring road. It is proposed to place the recommendations of the B&WC in the next meeting of the Finance Committee.