

Inspection Report of Flood Damage work

Name of PIUs:- RWD Works Division, Benipur

Name of Block/Road:- Ghanakhyampur | pmgry to Dih Musahari.

A. For Road

1. Damage Location Chainage:- QA. 200 M
2. Damage Length :- 25.0 m
3. Nature of Damage :- Road crust & flanks.
4. Details of Restoration Works
 - i. Material being used in Restoration works:- Brick + bats, Bamboo
 - ii. Equipment's /Tools being used in Restoration works:- Tractor & JCB
 - iii. Procedure taken up in Restoration works:- Filling & leveling.
 - iv. Restored Length:- 25.0 m.

B. For Bridge

1. Damage Location Chainage:-
2. Damage Length :-
3. Nature of Damage :-
4. Details of Restoration Works
 - i. Material being used in Restoration works:-
 - ii. Equipment's /Tools being used in Restoration works:-
 - iii. Procedure taken up in Restoration works:-
 - iv. Restored Length:-

Signature of JE/AE/EE



Signature
(Name of Inspection)

3036
1411-14
RR

FDR 2021-22

पथ का नाम :- L 21(17) P.M.C.S.Y. to Din Mushahari

पथ की लम्बाई :-

प्राक्कलित राशि :- Rs 75089 = 00.

प्रतिवेदन

माह मई के अंतिम सप्ताह से लेकर माह अक्टूबर के तीसरे सप्ताह तक लगातार भारी वर्षा, परिणामस्वरूप आयी बाढ़ के चलते अधिकांश पथ अंशतः अथवा पूर्णतः जलमग्न हो गये, पथ में कटाव हो गया एवं यातायात बाधित हो गया।

जनहित, कार्यहित एवं आसन्न पंचायत आम चुनाव एवं विभागीय सचिव महोदय के आदेश (पत्रांक- मु0अ0-4(मू0) विविध कार्य-23-60/2020-1937 पटना, दिनांक-07.07.2021) के आलोक में क्षतिग्रस्त पथों को ईट टुकड़ों से भरकर यातायात बहाल किया गया।

जलस्तर कम होने एवं पानी का बहाव बन्द होने के पश्चात् आदेशानुसार किये गये कार्य के अनुसार प्राक्कलन तैयार कर घटनोत्तर स्वीकृति हेतु समर्पित की जा रही है। कार्यहित में प्राक्कलन की स्वीकृति अपेक्षित है।

प्राक्कलन को कार्य अंचल, दरभंगा द्वारा स्वीकृत अद्यतन दर के आधार पर तैयार कर अग्रेतर कार्रवाई हेतु समर्पित की जाती है।

3-11-21

कनीय अभियंता

ग्रा0का0वि0, कार्य प्रशाखा,

अलीनगर

09/22/1855

Chashi
3/11/21

सहायक अभियंता

ग्रा0का0वि0 कार्य अवर प्रमंडल,

अलीनगर

09/22/1855

8/11/21

कार्यपालक अभियंता

ग्रामीण कार्य विभाग

कार्य प्रमंडल, बेनीपुर

name of work : Detailed estimate for FDR to the Road
from L21 (Pr) P.M.O.S.Y to Dih Musahadi
for the year 2021-22

- (A) Pro & billing the bricks-bats including
the cost of bricks-bats and labours all
complete job as per specification &
direction of E/20C

Ch 200m

$$1 \times 25.0m \times 3.05m \times \frac{(0.450m + 0.300m)}{2} \\ = 28.593m^3$$

@ 2004 = 96/m³ ————— Rs 57328=00

- (B) Labour for cutting 62mm to 75mm dia
bamboo poles to size and making shoes &
driving etc all complete job as per
direction and specification of E/20C

$$2 \times 15 Nos \times 1.20m = 36.0m$$

@ Rs 31 = 20/m ————— Rs 1123=00

- (C) Labour for fitting and fixing 62mm to
75mm bamboo runners in position at
every vertical piles ----- E/20C

$$2 \times 3.00 \times 25.00 = 150.0m \\ \Rightarrow 25.0 Nos.$$

@ Rs 141 = 50/each ————— Rs 3538=00

Rs 61989=00

P.T.O

B.F

Rs 61989=00

(D) Labour for biting and binning split bamboo woven Chachari in position with 20 sqg Gal wire ----- E/2.C

$$2 \times 25.0m \times (0.450m) = 22.50m^2$$

Q Rs 82=20/m² ----- Rs 1850=00

Rs 63839=00

Add 12% GST ----- (+) Rs 7661=00

Add 1% LC ----- (+) Rs 638=00

Add 10% SF

28.593 m² x 1032 x .10 ----- (+) Rs 2951=00

Rs 75089=00

3/11/21

JE

3/11/21
AE

3/11/21
EE

Checked and Verified -----

11/12/21
JE

11/12/21
EE

Technically same for the Rs. 75089=00
(Rupees Seventy five thousand eight hundred and nine only.)

Superintending Engineer
RWD, Works Circle, Darbhanga

DESCRIPTION		Unit	Quantity	Rate	Amount in Rs
BRICK BATS PITCHING MANUAL MEANS					
Labour for laying dry graded Jhama Khoa or stone filter under Brick pitching or Boulder Pitching in slope or apron including light ramming etc. all complete as per approved design, specification and Direction of E/I					
Unit = Per Cum					
Taking output = 2.832 Cum					
a) Labour					
Mazdoor (Unskilled)					
b) Over Heads @ 12% on (a)	Nos.	3.00	304.00		912.00
Cost for 2.832 cum					109.44
Rate per cum (Rs)					1,021.44
Total Cost					360.68
1.4 RCD					360.68
Cost of Haulage Excluding Loading and Unloading					
Haulage of materials by Tractor excluding cost of loading, unloading and stacking					
Unit = t.Km					
Taking output = 3.60 tonnes load and lead 10 km=36.0 t.km					
(i) Surface Road					
Speed with Load:15 km/hour					
Speed while Returning empty:25km/hour.					
a) Machinery					
Tractor 3.6 tonne capacity					
Time taken for onward haulage with load	hour	0.667	612.00		408.20
Time taken for empty return trip.	hour	0.400	612.00		244.80
b) Over Heads @ 12% on (a)					78.36
Cost for 36 t Km=a+b					731.36
Rate per t.km=(a+b)/36					20.32
Total Cost					20.32
(ii) Unsurfaced Graveled Road					
Speed with Load:12 km/hour					
Speed while Returning empty:20km/hour.					
a) Machinery					
Tractor 3.6 tonne capacity					
Time taken for onward haulage with load	hour	0.833	612.00		509.80
Time taken for empty return trip.	hour	0.500	612.00		306.00
b) Over Heads @ 12% on (a)					97.90
Cost for 36 t Km=a+b					913.69
Rate per t.km=(a+b)/36					25.38
Total Cost					25.38
(iii) Katcha Track and Track in River Bed/Nallah Bed and Choe Bed					
Speed with Load:10 km/hour					
Speed while Returning empty:15km/hour.					
a) Machinery					
Tractor 3.6 tonne capacity					
Time taken for onward haulage with load	hour	1.000	612.00		612.00
Time taken for empty return trip.	hour	0.667	612.00		408.20
b) Over Heads @ 12% on (a)					122.42
Cost for 36 t Km=a+b					1,142.63
Rate per t.km=(a+b)/36					31.74
Total Cost					31.74

DESCRIPTION	Unit	Quantity	Rate	Amount in Rs
Loading and Unloading of Stone Boulder/Stone aggregates/Sand/Kanker/Moorum				
Placing Tractor at Loading point, loading with front loader, dumping turning for return trip, excluding for haulage and return trip				
Unit = Cum				
Taking output = 2.25 Cum				
Time Required for				
i) Positioning of Tractor at loading point	1 Min			
ii) Loading by Front end loader 1 Cum Bucket Capacity @ 25 Cum per hour	5 Min			
iii) Maneuvering, reversing, dumping and turning for return	0 Min			
iv) Waiting time, unforeseen contingencies etc	0 Min			
Total	6 Min			
a) Labour				
Mate	day	0.03	321.00	9.63
Mazdoor for loading and unloading	day	0.72	304.00	218.88
b) Machinery				
Tractor 3.6 tonne capacity	hour	0.1	612.00	61.20
Front end-loader 1 cum bucket capacity @25 cum/hour	hour	0.083	1594.00	132.30
c) Over Heads @ 12% on (a+b)				50.64
Cost for 2.25 cum=(a+b+c)				472.65
Rate per cum (Rs)				210.07
Note:- Unloading will be done manually				
1 Supplying for Brick Bats (with OH)				
A. Basic Rate of Brick Bats	Per Cum		1032.00	1032.00
Add overhead charges		12%		123.84
Total				1155.84
Surface Lead	KM	7		
Katcha Track and Track in River Bed/Nallah Bed and Choe Bed	KM	1		
Factor(3.6/2.25)	Cum	1.6		
B. Carriage(with OH)				
((1.6*7*20.32)+(1.6*1*31.74)+(210.07))				488.438
C. Cost of Labour for Pitching and Light Ramming as per WRD SOR 6.6.1(with OH)				360.68
Total (A+B+C)				2004.96
For (7km.p+1kmk)= without (GST+LC+SF)				2004.96
For (6km.p+1kmk)= without (GST+LC+SF)				1972.45
For (5km.p+1kmk)= without (GST+LC+SF)				1939.93
For (4km.p+1kmk)= without (GST+LC+SF)				1907.42
For (3km.p+1kmk)= without (GST+LC+SF)				1874.91

		DESCRIPTION	Unit	Quantity	Rate	Amount in Rs
		Labour for cutting 62 mm to 75 mm dia bamboo piles to size and making shoes and driving etc. complete job as per specification and direction of E / I.				
		Unit :- Per M				
		Taking Out put:- 30.50 Mtr				
		(Assuming 20 nos. pile sunk 1.525 mtr deep)				
		Total depth sunk 30.50 meter				
		Labour				
		Carpenter Gr II	Nos	0.25	364	91.00
		Unskilled mazdoor for piling	Nos	2.5	304	760.00
						102.12
		Add Overhead charge 12 %				953.12
						31.25
		Rate	M			31.20
		Say Rs	M			
2	5.7.8 WRD SOR	Labour for fitting and fixing split bamboo woven chachari in position with 20 swg G.I. wire or 75 mm to 100 mm long nails alternatively including cost of G.I. wire or nails complete job as per specification and direction of E / I.				
		Unit :- Per M2				
		Taking Out put:- 9.30 Sqm				
		(Assuming strip of 3.05x3.05 = 9.30 sqm)				
		Materials				
		75 mm to 100 mm long nails (BCD)	Kg	0.25	58	14.50
		Labour				
		Carpenter Gr II	Nos	1	364	364.00
		Unskilled mazdoor	Nos	1	304	304.00
						81.90
		Add Overhead charge 12 %				764.40
						82.19
		Rate	M			82.20
		Say Rs	M			
3	5.7.9 WRD SOR	Labour for fitting and fixing 62mm to 75 mm dia bamboo runners in position at every vertical pile with 150 mm long nails or 38 swg G.I. wire including cost of G.I. wire or nails complete job as per specification and direction of E / I.				
		Unit :- Per M				
		Taking Out put:- 30.50 Mtr				
		Materials				
		75 mm to 100 mm long nails (BCD)	Kg	0.5	58	29.00

		Labour				
		Carpenter Gr II	Nos	0.125	364	45.50
		Unskilled mazdoor	Nos	0.25	304	76.00
						18.06
		Add Overhead charge 12 %				168.56
						5.53
		Rate	M			5.50
		Say Rs	M			
		Supply Of Bamboo				
	A	Bamboo 6m to 8 m	Nos	1	141.5	141.5
		Gross Truck Capacity(Unit Per%)(280Per Trip)				
		Gross Tractor Capacity(Unit Per%)(183Per Trip)				
		Carriage Including Loading and Unloading				
1.4 RCD		Cost of Haulage Excluding Loading and Unloading				
		Haulage of materials by Tractor excluding cost of loading, unloading and stacking				
		Unit = t.Km				
		Taking output = 3.60 tonnes load and lead 10 km=36.0 t.km				
		(i) Surface Road				
		Speed with Load:15 km/hour				
		Speed while Returning empty:25km/hour.				
		a) Machinery				
		Tractor 3.6 tonne capacity				
		Time taken for onward haulage with load	hour	0.667	612.00	408.20
		Time taken for empty return trip.	hour	0.400	612.00	244.80
						653.00
		Cost for 36 t Km=a				18.14
		Rate per t.km=(a+b)/36				18.14
		Total Cost	t.Km			18.14
		(ii) Unsurfaced Graveled Road				
		Speed with Load:12 km/hour				
		Speed while Returning empty:20km/hour.				
		a) Machinery				
		Tractor 3.6 tonne capacity				
		Time taken for onward haulage with load	hour	0.833	612.00	509.80
		Time taken for empty return trip.	hour	0.500	612.00	306.00
						815.80
		Cost for 36 t Km=a				22.66
		Rate per t.km=(a+b)/36				22.66
		Total Cost	t.Km			22.66
		(iii) Katcha Track and Track In River Bed/Nallah Bed and Choe Bed				
		Speed with Load:10 km/hour				
		Speed while Returning empty:15km/hour.				
		a) Machinery				
		Tractor 3.6 tonne capacity				
		Time taken for onward haulage with load	hour	1.000	612.00	612.00
		Time taken for empty return trip.	hour	0.667	612.00	408.20
						1,020.20
		Cost for 36 t Km=a				28.34
		Rate per t.km=(a+b)/36				28.34
		Total Cost	t.Km			28.34
4.3 WRD SOR		Loading and Unloading of Bamboo				

		Unit= Tonne				
		Taking Output = 3.6 tonnes				
	a	Labour				
		Mate	N s	0.03	321	9.63
		Mazdoor for Loading and Unloading	N s	0.72	304	218.88
	b	Machinery				
		Tractor 3.6 Tonne capacity	H. ur	0.72	612.00	440.64
		Rate	M			669.15
						185.88
		Surface Lead	Kil	2		
		Katcha Track and Track in River Bed/Nallah Bed and Choe Bed	Kil	1		
		Factor(8/280)	N s	0.02857		
		Carriage(without OH)				
	B	$((0.02857 \times 2 \times 18.14) + (0.02857 \times 1 \times 28.34) + (185.88 \times 0.02857))$				7.16
		A+B				148.66
		Add Overhead charge 12 %				17.84
		Rate	N			166.50
		Say Rs	N			166.50
	Sr.No.27 5 WRD SOR	Supply Of FC bags including Carriage				
		Materials				
		Old Empty Cement Bags (Synthetic)(Annexure I)	Per 100 Nos			
		Add Overhead charge 12 %				292
		Rate	N			35.04
		Say Rs	N			327.04
	5.7.40.1 WRD SOR	Labour for filling empty cement bags with local sand, stitching the bags and placing including supply of sutli and EC Bags etc. at site in dry portion all complete as per approved design, specifications and direction of E/I Including Cost and Carriage of Sand				327.00
		Unit=Per 100Nos				
		Taking Out put:- 100 nos				
	a	For filling & stitching & stacking				
		Unskilled mazdoor for filling sand into bags and sewing				
		Sutali	Nos	2	304	608
	F		Kg	0.5	19.75	9.875
	b	Labour rates for carrying filled E.C Bags				617.875
	G	Unskilled mazdoor for carrying filled bags and placing to work site	Nos	3	304	912

C	T	Cost of Sand & Carriage by Tractor			
		Cost of Sand			
1.4 RCD		Carriage Including Loading and Unloading	Cum	1	141.85
		Cost of Haulage Excluding Loading and Unloading			141.85
		Haulage of materials by Tractor excluding cost of loading, unloading and stacking			
		Unit = t.Km			
		Taking output = 3.60 tonnes load and lead 10 km=36.0 t.km			
		(i) Surface Road			
		Speed with Load:15 km/hour			
		Speed while Returning empty:25km/hour.			
	a)	Machinery			
		Tractor 3.6 tonne capacity			
		Time taken for onward haulage with load	hour	0.667	612.00
		Time taken for empty return trip.	hour	0.400	612.00
		Cost for 36 t Km=a			244.80
		Rate per t.km=(a+b)/36			653.00
		Total Cost	t.Km		18.14
		(ii) Unsurfaced Graveled Road			
		Speed with Load:12 km/hour			
		Speed while Returning empty:20km/hour.			
	a)	Machinery			
		Tractor 3.6 tonne capacity			
		Time taken for onward haulage with load	hour	0.833	612.00
		Time taken for empty return trip.	hour	0.500	612.00
		Cost for 36 t Km=a			306.00
		Rate per t.km=(a+b)/36			815.80
		Total Cost	t.Km		22.66
		(iii) Katcha Track and Track in River Bed/Nallah Bed and Choe Bed			
		Speed with Load:10 km/hour			
		Speed while Returning empty:15km/hour.			
	a)	Machinery			
		Tractor 3.6 tonne capacity			
		Time taken for onward haulage with load	hour	1.000	612.00
		Time taken for empty return trip.	hour	0.667	612.00
		Cost for 36 t Km=a			408.20
		Rate per t.km=(a+b)/36			1,020.20
		Total Cost	t.Km		23.34
					23.34
1.1 RCD		Loading and Unloading of Stone Boulder/Stone aggregates/Sand/Kanker/Moorum			
		Placing Tractor at Loading point, loading with front loader, dumping turning for return			
		Unit = Cum			
		Taking output = 2.25 Cum			
		Time Required for			
		i) Positioning of Tractor at loading point	1 Min		
		ii) Loading by Front end loader 1 Cum Bucket Capacity @ 25 Cum per hour	5 Min		
		iii) Maneuvering, reversing, dumping and turning for	0 Min		
		iv) Waiting time, unforeseen contingencies etc	0 Min		
		Total	6 Min		
	a)	Labour			

		Mate				
		Mazdoor for loading and unloading	day	0.03	321.00	9.63
			day	0.72	304.00	218.88
		b) Machinery				
		Tractor 3.6 tonne capacity	hour	0.1	612.00	61.20
		Front end-loader 1 cum bucket capacity @25 cum/hour	hour	0.083	1594.00	132.30
		Cost for 2.25 cum=(a+b)				422.01
		Rate per cum (Rs)				187.56
Note:-		Unloading will be done manually				
		Surface Lead	KM	2		
		Katcha Track and Track in River Bed/Nallah Bed and Choe Bed	KM	1		
		Factor(3.6/2.25)	Cum	1.6		
		U Carriage(without OH)				
		((1.6*2*18.14)+(1.6*1*28.34)+(187.56))				290.952
	V	T+U				432.802
	H	Cost of Sand & Carriage By Tractor per for 100nos bag				1,471.53
		For 100 Bags 3.4 Cum Sand Required				
	I	e Cost of EC Bag per 100nos				292
		Total(F+G+H+I)				3293.40
		Add Overhead charge 12 %				395.21
						3688.61
		Rate	No			36.8861
		Say Rs	No			36.90
		Supply of Sand Bag(without OH)				
	A	Basic Rate of Sand Bag	Nos	1	8.48	8.48
		1 No. Cement Bag Filled with 40 Kg/1.2 Cft Sand				
		Conversion Factor 1m ³ =35.3146667ft ³				
		1 Cubic Meter= Cubic Foot/35.3146667				
		2 Cubic Meter= 1.2/35.3146667				
		3 Cubic Meter= 0.034				
		Hence 1 Bo. Sand Bag Filled with 0.034 Cum sand				
		Tractor				
		Surface Lead	KM	2		
		Katcha Track and Track in River Bed/Nallah Bed and Choe Bed	KM	1		
		Factor(3.6/2.25)	Cum	1.6		
		B Carriage(without OH)				
		((1.6*2*18.14)+(1.6*1*28.34)+(187.56))				290.952
		Cost of Carriage of Sand in Filling of Sand Bag	No	1		9.89
12.9		Labour for filling empty cement bags with local sand, stitching the bags and placing including supply of sutli and EC Bags etc, as per specifications and direction of E/I				
RCD		C Unit=Per Bag				

Taking Out put:- 750 Bags				
Unskilled mardoor for filling sand into bags and sewing				
	Nos	15	304	4560.00
Sutall	Kg	5.75	19.75	74.06
				4634.06
Rate Per Bag				6.18
D Labour rates for carrying filled E.C Bags				
Unskilled mardoor for carring filled bags and placing to work site				
	Nos	22.5	304	6840
Rate Per Bag				9.12
Total(A+B+C+D)				
				33.67
Add Overhead charge 12 %				
				4.04
Rate	No			37.71
Say Rs	No			37.70