

General Abstract		
<b>NAME OF WORK : CWSS to Kayathar, Kalugumalai, Ettayapuram TP and 161 Rural Habitations in Thoothukudi District and Sattur Municipality in Virudhunagar District and CWSS to Sinthalakarai in Thoothukudi District for the period from 16.07.2022 to 31.03.2023)</b>		
Sl.No	Description	Amount in Rs.
1	OPERATION AND MAINTENANCE OF CWSS TO KAYATHAR KALUGUMALAI AND ETTAYAPURAM TPS IN THOOTHUKUDI DISTRICT AND SATTUR MUNICIPALITY IN VIRUDHUNAGAR DISTRICT AND BULK PROVISION TO 161 RURAL HABITATIONS IN THOOTHUKUDI DISTRICT	<b>8524768.60</b>
2	OPERATION AND MAINTENANCE OF CWSS TO SINDALAKKARAI CWSS IN KOVILPATTI AND VILATHIKULAM UNION	<b>668955.62</b>
	<b>TOTAL</b>	<b>9193724.22</b>

I / We agree to execute the above item of works at % Excess over / Less , than the departmental value of Rs. 9193724.22( Rupees Ninety one lakhsninety three thousand seven hundred and twenty four and paise twenty two only)

Contractor

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Superintending Engineer, TWAD

**SCHUDLE - A1**

**NAME OF WORK : OPERATION AND MAINTENANCE OF CWSS TO KAYATHAR KALUGUMALAI AND ETTAYAPURAM TPS IN THOOTHUKUDI DISTRICT AND SATTUR MUNICIPALITY IN VIRUDHUNAGAR DISTRICT AND BULK PROVISION TO 161 RURAL HABITATIONS IN THOOTHUKUDI DISTRICT**

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
1	Operation and Maintenance of the Electro Mechanical installations, equipments, components, pipelines valves and appurtenances, water retaining structures including protecton of all scheme components from damages/ theft undertaking legal actions for such untoward incidents, preventive maintenance, disinfection and deliverance of water as per quality standards and supply of earmarked quantity of water <b>8.88 MLD</b> to the beneficiaries as per Annexure carrying out the O&M as per standard operating procedures, Acts and rules in force etc., complete and as directed by TWAD Board Officers and excluding cost towards attending leak, burst repair and replacement works to electro mechanical installations consumables for disinfection of water, cleaning of all water retaining structure, electricity .Totally - <b>2299.92 ML (8.88 x 259)</b>	2299.920	ML	Special Specifications	2784.12	Rupees Two Thousand Seven Hundred EightyFour Paise Twelve Only	6403253.27

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
2.a)	<b>Attending collar Leaks occurred in all the size, class and material of pipes in all the pipelines of this CWSS for the following items round the clock as per the standard specifications including earthwork excavation ,removal of slushy soil , labour charges, civil works, cost of materials, dewatering , genset, welding unit,and providing night lamps, barrigading arrangements, caution sign boards ,traffic diversion arrangements and all other incidental charges, etc complete within the stipulated time limit as specified in Clause 2.8 of General conditions of Contract Part II.and as</b>						
i)	Earth work excavation and depositing on bank in hard stiff clay, stiff black cotton soil, hard red earth, shales, murrums, ordinary gravel stoney earth mixed with small sized boulders etc., for leak rectification works for the following sizes of pipes with standard trench width and depth etc., complete and as directed by the TWAD Board officers.			SS 20 B, 95 and Special specifications			
a	For AC Pipes of various classes	93.801	m3		483.00	Rupees Four Hundred EightyThree Only	45305.88
b	For PSC Pipes of various classes	189.503	m3		483.00	Rupees Four Hundred EightyThree Only	91529.95
ii)	Supply and delivery of lead wool as per sample including loading, umloading and transportation charges etc. complete and as directed by TWAD Bd. Officers			Special Specifications			
a	200 mm AC of Various Classes	27.000	Kg		380.00	Rupees Three Hundred Eighty	10260.00
b	250 mm AC of Various Classes	61.000	Kg		380.00	Rupees Three Hundred Eighty	23180.00
c	350 mm dia PSC Pipe Various Classes	14.000	Kg		380.00	Rupees Three Hundred Eighty	5320.00
d	500 mm dia PSC Pipe Various Classes	36.000	Kg		380.00	Rupees Three Hundred Eighty	13680.00
e	600 mm dia PSC Pipe Various Classes	60.000	Kg		380.00	Rupees Three Hundred Eighty	22800.00

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Contractor

Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
iii)	Supply and delivery of Hard crete oil as per sample including loading, umloading and transportation charges etc. complete and as directed by TWAD Bd. Officers			Special Specifications			
a	200 mm AC of Various Classes	27.000	lit		105.00	Rupees One Hundred Five Only	2835.00
b	250 mm AC of Various Classes	79.000	lit		105.00	Rupees One Hundred Five Only	8295.00
c	350 mm dia PSC Pipe Various Classes	14.000	lit		105.00	Rupees One Hundred Five Only	1470.00
d	500 mm dia PSC Pipe Various Classes	27.000	lit		105.00	Rupees One Hundred Five Only	2835.00
e	600 mm dia PSC Pipe Various Classes	50.000	lit		105.00	Rupees One Hundred Five Only	5250.00
iv)	Supply and delivery of cement			SS 10 and Special Sncification			
a	200 mm AC of Various Classes	60.000	Kg		5.96	Rupees Five Paise NinetySix Only	357.60
b	250 mm AC of Various Classes	106.000	Kg		5.96	Rupees Five Paise NinetySix Only	631.76
c	350 mm PSC of Various Classes	21.000	Kg		5.96	Rupees Five Paise NinetySix Only	125.16
d	500 mm PSC of Various Classes	45.000	Kg		5.96	Rupees Five Paise NinetySix Only	268.20
e	600 mm PSC of Various Classes	70.000	Kg		5.96	Rupees Five Paise NinetySix Only	417.20
v)	Dewatering using 5HP diesel engine pumpset			Special Specification			
a	200 mm AC of Various Classes	20.000	Hours		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	5930.00
b	250 mm AC of Various Classes	47.000	Hours		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	13935.50
c	350 mm PSC of Various Classes	14.000	Hours		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	4151.00
d	500 mm PSC of Various Classes	36.000	Hours		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	10674.00
e	600 mm PSC of Various Classes	60.000	Hours		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	17790.00

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
vi)	Refilling with excavated soil (other than sand) complying with standard specification in layers of 15cm watered well rammed and consolidated after the pipes and specials are laid, jointed and tested etc. and removing and depositing the surplus earth at the places shown by the TWAD Board Officers.			SS 24, 95 and Special specifications			
a	For AC Pipes of various classes	93.801	m3		33.60	Rupees ThirtyThree Paise Sixty	3151.71
b	For PSC Pipes of various classes	189.503	m3		33.60	Rupees ThirtyThree Paise Sixty	6367.30
2)	<b>Attending Leaks occurred in all the size, class and material of pipes in all the pipelines of this CWSS for the following items with MS Clampsets round the clock as per the standard specifications including earthwork excavation, removal of slushy soil, labour charges, civil works, cost of materials, dewatering, and providing night lamps, barricading arrangements, caution sign boards, traffic diversion arrangements and all other incidental charges, etc complete within the stipulated time limit as specified in Clause 2.2.5 of General conditions of Contract Part II. and as directed by TWAD Board officers.</b>						
i)	Earth work excavation and depositing on bank in hard stiff clay, stiff black cotton soil, hard red earth, shales, murrums, ordinary gravel stoney earth mixed with small sized boulders etc., for leak rectification works for the following sizes of AC pipes with standard trench width and depth etc., complete and as directed by the TWAD Board officers.			SS 20 B, 23, 95 and Special specifications			
a)	For AC Pipes of various classes	94.662	m3		483.00	Rupees Four Hundred EightyThree Only	45721.75
b)	For PSC Pipes of various classes	169.312	m3		483.00	Rupees Four Hundred EightyThree Only	81777.70

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Contractor

Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
ii)	Supply and delivery of Leak Arresting Flexible MS Clamps of Wrap Around by the engineer incharge at site depending on the nature of pipe crack etc., complete and as directed by TWAD Board Officers			Special Specifications			
a	200m MS Clampset	8.000	No		2013.52	Rupees Two Thousand Thirteen Paise FiftyTwo Only	16108.16
b	250mm MS Clampset	14.000	No		2395.26	Rupees Two Thousand Three Hundred NinetyFive Paise TwentySix Only	33533.64
c	350 mm MS Clampset for PSC Pipe	7.000	No		3832.80	Rupees Three Thousand Eight Hundred ThirtyTwo Paise Eighty Only	26829.60
d	500 mm MS Clampset for PSC pipe	8.000	No		4608.00	Rupees Four Thousand Six Hundred Eight Only	36864.00
e	600 mm MS Clampset for PSC pipe	8.000	No		5406.66	Rupees Five Thousand Four Hundred Six Paise SixtySix Only	43253.28
iii)	Dewatering using 5HP diesel engine pumpset including Hire charges, cost of Diesel, Engine oil, pump operator, labour charges, conveyance of pumpset and fuel to site and back, loading, unloading and any other incidental charges etc., complete. And as directed by TWAD Board officers			Special Specifications			
a	200 mm AC Class 15	22.000	Hour		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	6523.00
b	250 mm AC Class 15	55.000	Hour		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	16307.50
c	350 mm dia PSC Pipe Various Classes	21.000	Hour		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	6226.50
d	500 mm dia PSC Pipe Various Classes	40.000	Hour		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	11860.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
e	600 mm dia PSC Pipe Various Classes	56.000	Hour		296.50	Rupees Two Hundred NinetySix Paise Fifty Only	16604.00
iv)	Refilling with excavated soil (other than sand)complying with standard specification in layers of 15cm watered well rammed and consolidated after the pipes and specials are laid,jointed and tested etc. and removing and depositing the surplus earth at the places shown by the TWAD Board Officers.			SS 24, 95 and Special specifications			
a	For AC Pipes of various classes	94.662	m3		33.60	Rupees ThirtyThree Paise Sixty Only	3180.64
b	For PSC Pipes of various classes	169.312	m3		33.60	Rupees ThirtyThree Paise Sixty Only	5688.88
3)	<b>Attending burst occurred in all the size, class and material of pipes in all the pipelines of this CWSS for the following items with replacing the pipes round the clock as per the standard specifications including earthwork excavation ,removal of slushy soil , labour charges, civil works, cost of materials, dewatering , genset, welding unit,and providing night lamps, barrigading arrangements, caution sign boards ,traffic diversion arrangements and all other incidental charges, etc complete within the stipulated time limit as specified in Clause 2.2.5 of General conditions of Contract Part II and as directed by TWAD</b>						

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
i)	Earth work excavation and depositing on bank in hard stiff clay, stiff black cotton soil, hard red earth, shales, murrums, ordinary gravel stoney earth mixed with small sized boulders etc., for leak rectification works for the following sizes of AC pipes with standard trench width and depth etc., complete and as directed by the TWAD Board officers.			SS 20 B, 95 and Special specifications			
a	For AC Pipes of various classes	34.780	m3		96.60	Rupees NinetySix Paise Sixty Only	3359.75
b	For PSC Pipes of various classes	30.053	m3		96.60	Rupees NinetySix Paise Sixty Only	2903.12
c	For PVC Pipes of various classes	142.229	m3		96.60	Rupees NinetySix Paise Sixty Only	13739.32
ii)	Supply and delivery of the following sizes of pipes confirming to IS specifications including transportation to any where in Tamilnadu etc., complete and as directed by TWAD Board Officers			IS 4985/2000, IS 8329/2000 and IS 3589/2001 and as amended from time to time and special specification			
a	150 mm DI K7 Class	2.000	m		1615.00	Rupees One Thousand Six Hundred Fifteen Only	3230.00
b	200 mm DI K7 Class	2.000	m		2120.00	Rupees Two Thousand One Hundred Twenty Only	4240.00
c	250 mm DI K7 Class	2.000	m		2797.00	Rupees Two Thousand Seven Hundred NinetySeven Only	5594.00
d	355.6 mm x 5.6 mm thick MS PIPE with Internal food grade epoxy coating 406 micr.per metre and External epoxy Coating 406 micr. Per metre	1.000	m		6469.00	Rupees Six Thousand Four Hundred SixtyNine Only	6469.00
e	508 mm x 6.3 mm thick MS PIPE with Internal food grade epoxy coating 406 micr.per metre and External epoxy Coating 406 micr. Per metre	1.000	m		9099.00	Rupees Nine Thousand NinetyNine Only	9099.00
f	610 mm x 6.3 mm thick MS PIPEwith Internal food grade epoxy coating 406 micr.per metre and External epoxy Coating 406 micr. Per metre	1.000	m		11170.00	Rupees Eleven Thousand One Hundred Seventy Only	11170.00

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Superintending Engineer, TWAD



Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
g	50mm PVC 6KSC	12.000	m		69.50	Rupees SixtyNine Paise Fifty Only	834.00
h	63mm PVC 4KSC	15.000	m		78.50	Rupees SeventyEight Paise Fifty Only	1177.50
i	75mm PVC 4KSC	15.000	m		109.00	Rupees One Hundred Nine Only	1635.00
j	90mm PVC 4 KSC	8.000	m		151.00	Rupees One Hundred FiftyOne Only	1208.00
k	110mm PVC 4KSC	8.000	m		216.50	Rupees Two Hundred Sixteen Paise Fifty Only	1732.00
l	140mm PVC 4KSC	5.000	m		357.50	Rupees Three Hundred FiftySeven Paise Fifty Only	1787.50
m	160mm PVC 4KSC	5.000	m		465.50	Rupees Four Hundred SixtyFive Paise Fifty Only	2327.50
iii)	Supply and delivery of following sizes of Specials conforming to IS specifications at site of work including loading, unloading, transportation, insurance, etc., Complete and as directed by TWAD Bd. officers			IS 10124/1982 Part - II, IS 9523/2000 and amended from time to time and special specification			
a	150mm MJ Collars for DI pipe	1.000	Nos		4264.00	Rupees Four Thousand Two Hundred SixtyFour Only	4264.00
b	200mm MJ Collars for DI pipe	1.000	Nos		5565.00	Rupees Five Thousand Five Hundred SixtyFive Only	5565.00
c	250mm MJ Collars for DI pipe	1.000	Nos		7747.00	Rupees Seven Thousand Seven Hundred FourtySeven Only	7747.00
d	350mm MJ Collars for MS pipe	1.000	Nos		14358.00	Rupees Fourteen Thousand Three Hundred FiftyEight Only	14358.00
e	400mm MJ Collars for MS pipe	1.000	Nos		25254.00	Rupees TwentyFive Thousand Two Hundred FiftyFour Only	25254.00

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
f	450mm MJ Collars for MS pipe	1.000	Nos		32226.00	Rupees ThirtyTwo Thousand Two Hundred TwentySix Only	32226.00
g	50 mm PVC Coupler Fabricated 6 KSC	20.000	Nos		7.00	Rupees Seven Only	140.00
h	63 mm PVC Coupler Fabricated 4 KSC	30.000	Nos		9.00	Rupees Nine Only	270.00
i	75 mm PVC Coupler Fabricated 4 KSC	24.000	Nos		13.00	Rupees Thirteen Only	312.00
j	90 mm PVC Coupler Fabricated 4 KSC	10.000	Nos		21.00	Rupees TwentyOne Only	210.00
k	110 mm PVC Coupler Fabricated 4 KSC	10.000	Nos		33.00	Rupees ThirtyThree Only	330.00
l	140 mm PVC Coupler Fabricated 4 KSC	10.000	Nos		60.00	Rupees Sixty Only	600.00
m	160 mm PVC Coupler Fabricated 4 KSC	10.000	Nos		93.00	Rupees NinetyThree Only	930.00
iv)	Removing following the burst Pipes from the pipe line and removal of slushy soil and baling out water and replacing the pipe line with sound pipe including jointing and cost of refilling the pipe line with water for retesting the pipe line etc complete (excluding cost of sound pipe and jointing materials and earth work) and as directed by the TWAD Board Officers			Special Specifications			
a	150 mm dia AC Class 15 Pipe	1.000	Nos		1268.40	Rupees One Thousand Two Hundred SixtyEight Paise Fourty	1268.40
b	200 mm dia AC Class 15 Pipe	2.000	Nos		1779.90	Rupees One Thousand Seven Hundred SeventyNine Paise	3559.80
c	250 mm dia AC Class 15 Pipe	2.000	Nos		2276.40	Rupees Two Thousand Two Hundred SeventySix Paise Fourty Only	4552.80
d	For 350 mm PSC Pipes of various classes	1.000	Nos		4538.20	Rupees Four Thousand Five Hundred ThirtyEight Paise Twenty	4538.20
e	For 500 mm PSC Pipes of various classes	1.000	Nos		7224.60	Rupees Seven Thousand Two Hundred TwentyFour Paise Sixty	7224.60
f	For 600 mm PSC Pipes of various classes	1.000	Nos		8446.10	Rupees Eight Thousand Four Hundred FourtySix Paise Ten Only	8446.10

Contractor

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Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
g	50mm PVC 6KSC	10.000	Nos		339.90	Rupees Three Hundred ThirtyNine Paise Ninety Only	3399.00
h	63mm PVC 4KSC	15.000	Nos		339.90	Rupees Three Hundred ThirtyNine Paise Ninety Only	5098.50
i	75mm PVC 4KSC	12.000	Nos		426.80	Rupees Four Hundred TwentySix Paise Eighty Only	5121.60
j	90mm PVC 4 KSC	5.000	Nos		568.30	Rupees Five Hundred SixtyEight Paise Thirty Only	2841.50
k	110mm PVC 4KSC	5.000	Nos		690.10	Rupees Six Hundred Ninety Paise Ten Only	3450.50
l	140mm PVC 4KSC	5.000	Nos		1010.40	Rupees One Thousand Ten Paise Fourty Only	5052.00
m	160mm PVC 4KSC	5.000	Nos		1010.40	Rupees One Thousand Ten Paise Fourty Only	5052.00
<b>4.a)</b>	<b>Carrying out the following repair works occurring during the maintenance period in the Electrical, Mechanical and Elctro-mechanical items to bring back the scheme / components into normal running condition as per standard specification including all labour charges, cost of materials and all incidental charges within the stipulated time limit etc., complete as specified in Clause 2.2.6 of General conditions of Contract Part II etc as directed by TWAD Board officers</b>			Special Specifications			
i)	Rewinding of motor and reconditioning pump and repair works to 7.5 HP Open Well Submersible Pump Set ( 950 LPM X 17M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of Submersible pumpset at Seevalaperi Head Works in Infiltration Well - 18 Nos	1.000	Nos		28800.00	Rupees TwentyEight Thousand Eight Hundred Only	28800.00

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
ii)	Rewinding of motor and repair works to 100 HP centrifugal HSC Motor ( 5138lpm x 54 m Head ) including cost of all material ,conveyance ,labour charges for removing and re-erection of centrifugal HSC Motor Seevalaperi Head Works Pump Room - 3Nos(2+1)	1.000	Nos		85000.00	Rupees EightyFive Thousand Only	85000.00
iii)	Rewinding of motor and repair works to 50 HP centrifugal HSC Motor ( 4145 lpm x 30 m Head ) including cost of all material ,conveyance ,labour charges for removing and re-erection of centrifugal HSC Motor at Kayathar Pump Room - 3Nos (2+1)	1.000	Nos		50000.00	Rupees Fifty Thousand Only	50000.00
iv)	Rewinding of motor and repair works to 10 HP centrifugal HSC Motor ( 1111 LPM X 27 M Head ) including cost of all material ,conveyance ,labour charges for removing and re-erection of centrifugal HSC Motor at Nalatinpudur Pump Room.(Kalugumalai TP) - 2 Nos	1.000	Nos		23200.00	Rupees TwentyThree Thousand Two Hundred Only	23200.00
v)	Rewinding of motor and reconditioning pump and repair works to 5 HP (557LPM X 27 M)centrifugal Monobloc Pump set including cost of all material ,conveyance ,labour charges for removing and re-erection of Monobloc Pump set at Kayathar Pump Room to Kayathar TP- 2 Nos	1.000	Nos		22000.00	Rupees TwentyTwo Thousand Only	22000.00
vi)	Rewinding of motor and reconditioning pump and repair works to 2 HP Open Well Submersible Pump Set ( 118 LPM X 40 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of Submersible pumpset at Kalappaipatti sump -Therkum ailodai pumping - 2 Nos	1.000	Nos		19300.00	Rupees Nineteen Thousand Three Hundred Only	19300.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
vii)	Rewinding of motor and reconditioning pump and repair works to 5HP Open Well Submersible Pump Set (236LPM X 44 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of Submersible pumpset at Kayathar Sump - ayanaaroothu pumping - 2Nos	1.000	Nos		25700.00	Rupees TwentyFive Thousand Seven Hundred Only	25700.00
viii)	Rewinding of motor and reconditioning pump and repair works to 3 HP Open Well Submersible Pump set ( 202 lpm x 38 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of Submersible pumpset at Chidambarampatti Sump - 2 Nos	1.000	Nos		23100.00	Rupees TwentyThree Thousand One Hundred Only	23100.00
ix)	Rewinding of motor and reconditioning pump and repair works to 4 HP Centrifugal Monabloc Pump Set ( 277 lpm x 25 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of Centrifugal Monabloc Pump Set at Nalatinpudur - Muthusdamypuram pumping -2Nos	1.000	Nos		20000.00	Rupees Twenty Thousand Only	20000.00
x)	Rewinding of motor, reconditioning Pump and repair works to 15 HP HSCPump Set ( 1633lpm x 21) including cost of all material ,conveyance ,labour charges for removing and re-erection of Centrifugal Monabloc Pump Set at Nalatinpudur -To manthithopu - 2 Nos	1.000	Nos		25000.00	Rupees TwentyFive Thousand Only	25000.00
xi)	Rewinding of motor and reconditioning pump and repair works to 2 HP openwell submersible Set ( 168 lpm x 22 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of 2 HP openwell submersible Pump Set at Kalankaraipati - sankaralingpuram pumping- 2 Nos	1.000	Nos		19300.00	Rupees Nineteen Thousand Three Hundred Only	19300.00

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
xii)	Rewinding of motor and reconditioning pump and repair works to 5HP openwell submersible Set Pump Set ( 386 lpm x 25 M ) including cost of all material ,conveyance ,labour charges for removing and re-erection of 5HP openwell submersible Set Set at Kalankaraipati - Kalugasalapuram pumping- 2 Nos	1.000	Nos		25700.00	Rupees TwentyFive Thousand Seven Hundred Only	25700.00
<b>4) b</b>	<b>Repair/ reconditioning of Pumpsets</b>			Special Specifications			
i)	Repair and reconditioning works in 100 HP HSC centrifugal Pump ( 5138lpm x 54 m Head) including cost of all material exluding Bronze impeller ,conveyance ,labour charges for removing and re-erection of centrifugal HSC Pump at Seevalaperi Head Works Pump Room - 3Nos(2+1)	1.000	Nos		50000.00	Rupees Fifty Thousand Only	50000.00
ii)	Repair and reconditioning works to 50 HP HSC centrifugal Pump ( 4145 lpm x 30 m Head ) including cost of all material exluding Bronze impeller,conveyance ,labour charges for removing and re-erection of centrifugal HSC Pump at Kayathar Pump Room - 3Nos (2+1)	1.000	Nos		35000.00	Rupees ThirtyFive Thousand Only	35000.00
iii)	Repair and reconditioning works to 10 HP HSC centrifugal Pump ( 1111 LPM X 27 M Head) including cost of all material exluding Bronze impeller,conveyance ,labour charges for removing and re-erection of centrifugal HSC Pump at Nalatinpudur Pump Room.(Kalugumalai TP) - 2 Nos	1.000	Nos		15400.00	Rupees Fifteen Thousand Four Hundred Only	15400.00
iv)	Repair and reconditioning works in 15 HP HSC centrifugal Pump ( 1633lpm x 21 Head ) including cost of all material exluding Bronze impeller ,conveyance ,labour charges for removing and re-erection of centrifugal HSC Pump atNalatinpudur -To manthithopu - 2 Nos	1.000	Nos		16000.00	Rupees Sixteen Thousand Only	16000.00

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
<b>4) c</b>	<b>Repair and reconditioning of starter</b>			Special Specifications			
i)	Supply and delivery of 9 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		827.00	Rupees Eight Hundred TwentySeven Only	827.00
ii)	Supply and delivery of 12 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		961.00	Rupees Nine Hundred SixtyOne Only	961.00
iii)	Supply and delivery of 18 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		1656.00	Rupees One Thousand Six Hundred FiftySix Only	1656.00
iv)	Supply and delivery of 25 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		3558.00	Rupees Three Thousand Five Hundred FiftyEight Only	3558.00
v)	Supply and delivery of 32 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		4343.00	Rupees Four Thousand Three Hundred FourtyThree Only	4343.00
vi)	Supply and delivery of 70 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		8848.00	Rupees Eight Thousand Eight Hundred FourtyEight Only	8848.00
vii)	Supply and delivery of 100 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		14145.00	Rupees Fourteen Thousand One Hundred FourtyFive Only	14145.00
viii)	Supply and delivery of 160 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		22490.00	Rupees TwentyTwo Thousand Four Hundred Ninety Only	22490.00
ix)	Supply and delivery of 225Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		29787.00	Rupees TwentyNine Thousand Seven Hundred EightySeven Only	29787.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
x)	Supply and delivery of 300 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000	Nos		40515.00	Rupees Fourty Thousand Five Hundred Fifteen Only	40515.00
xi)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 10A-20A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		1486.00	Rupees One Thousand Four Hundred EightySix Only	1486.00
xii)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 50A-75A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		4294.00	Rupees Four Thousand Two Hundred NinetyFour Only	4294.00
xiii)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 75A-110A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		6348.00	Rupees Six Thousand Three Hundred FourtyEight Only	6348.00
xiv)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 150A-200A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		8599.00	Rupees Eight Thousand Five Hundred NinetyNine Only	8599.00
xv)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 200A-300A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		10357.00	Rupees Ten Thousand Three Hundred FiftySeven Only	10357.00
xvi)	Electric Motor protection device against single phasing. The device should protect the motor against single phasing, reverse phasing and unbalance supply. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply.	1.000	Nos		1152.00	Rupees One Thousand One Hundred FiftyTwo Only	1152.00

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Contractor

Superintending Engineer, TWAD



Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
xvii)	Electric Motor protection device against dry running. The device should protect the motor against Dry running. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply	1.000	Nos		1613.00	Rupees One Thousand Six Hundred Thirteen Only	1613.00
xviii )	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 5A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		1311.00	Rupees One Thousand Three Hundred Eleven Only	1311.00
xix)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 5A-10A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		1321.00	Rupees One Thousand Three Hundred TwentyOne Only	1321.00
xx)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 10A-20A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		1486.00	Rupees One Thousand Four Hundred EightySix Only	1486.00
xxi)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 20A-30A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		2152.00	Rupees Two Thousand One Hundred FiftyTwo Only	2152.00
xxii)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 30A-50A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000	Nos		2963.00	Rupees Two Thousand Nine Hundred SixtyThree Only	2963.00

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
xxiii )	Electric Motor protection device against single phasing. The device should protect the motor against single phasing, reverse phasing and unbalance supply. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply.	1.000	Nos		1152.00	Rupees One Thousand One Hundred FiftyTwo Only	1152.00
xxiv )	Electric Motor protection device against dry running. The device should protect the motor against Dry running. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply	1.000	Nos		1613.00	Rupees One Thousand Six Hundred Thirteen Only	1613.00
4 d)	Supply and delivery of direct online starter confirming to IS13947 and IEC60947-1 suitable KW rating for operation in AC/ three Phase/50HZ(+/- 5%) and 415V (+/- 10%) including Ammeter, Overload relay, under Voltage release with no Volt coil, Air Break contactors suitable for next Standard higher KW rating, Single phasing preventor, dry running preventor and On/Off Push button switches, including the capacitor(the cost of capacitor is to be taken separately).						
i	For 5 HP Starter - 2 Nos	2.000	Nos		5249.00	Rupees Five Thousand Two Hundred FourtyNine Only	10498.00
ii	For 3 HP Starter - 1 Nos	1.000	Nos		5249.00	Rupees Five Thousand Two Hundred FourtyNine Only	5249.00

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
4 e)	Supply and delivery of Star-Delta starter where panel boards are available confirming to IS 13947, IEC60947-1 and as amended thereafter with suitable KW rating for operation in AC/three Phase/50HZ(+/- 5%) and 415V (+/- 10%) including 3 pole magnetic ontactor with under voltage release - 3 nos., CT operated Ammeter(65 mm dia) with suppressed scale, Voltmeter (65mm dia), Voltmeter selector swith, Minature circuitr braeker, Thermal Overload relay, Air Break contactors suitable for next Standard higher KW rating, Single phasing preventor, dry running preventor and On/Off Push button switches, wiring with 1 sq.mm/4 sq. mm copper pvc insulated cable, powder coated vermin proof box, including the capacitor (the cost of capacitor is						
i	For 10HP Starter - 2 Nos	1.000	Nos		17447.00	Rupees Seventeen Thousand Four Hundred FourtySeven Only	17447.00

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
<b>4 f)</b>	<b>Attending cable fault by replacing the cable 10Nos of Infiltration wells at Seevalaperi Headworksite.</b>			IS 1554,IS 7098(Part I) /1988 with ISI Marking and Special specification			
i	Supply, delivery of 1.1 KV Grade 3 core 70 Sq. mm PVC insulated and steel Armoured aluminium cable as per I.S.7098 for following Wells submersible motor to main panel board.70 sqmm Aluminum armoured cable for 10 Nos of IW Including standby pumpset	50.000	m		321.00	Rupees Three Hundred TwentyOne Only	16050.00
ii	Supply, delivery of 1.1 KV Grade 3 core 4 Sq. mm Flat type copper Cable	30.000	m		186.00	Rupees One Hundred EightySix Only	5580.00
iii	Supply, delivery of 1.1 KV Grade 3 core 6 Sq. mm Flat type copper Cable	30.000	m		251.00	Rupees Two Hundred FiftyOne Only	7530.00
iv	Supply, delivery of 1.1 KV Grade3 core 10 Sq. mm Flat type copper Cable	30.000	m		435.00	Rupees Four Hundred ThirtyFive Only	13050.00
v	Laying of 1.1 KV Grade 3 core 70 Sq. mm PVC insulated steel Armoured aluminium cable as per I.E. rules to be laid in between Well Submersible motor and main panel board.70sqmm Aluminum armoured cable for 10 Nos of IW Including standby pumpset	50.000	m		160.00	Rupees One Hundred Sixty Only	8000.00
vi	Laying of 1.1 KV Grade 3 core 4 Sq. mm Flat type copper Cable	30.000	m		160.00	Rupees One Hundred Sixty Only	4800.00
vii	Laying of 1.1 KV Grade 3 core 6 Sq. mm Flat type copper Cable	30.000	m		160.00	Rupees One Hundred Sixty Only	4800.00
viii	Laying of 1.1 KV Grade 3 core 10 Sq. mm Flat type copper Cable	30.000	m		160.00	Rupees One Hundred Sixty Only	4800.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
ix)	Jonting the 1.1KV grade 3 Core 70 SQ mm PVC Insulated Steel armoured aluminum cable as per I E Rules including Jointing materials etc complete directed by the TWAD Board officers. 70 sq.mm cable for 10 Nos.of infiltration wells	5.000	Nos		320.00	Rupees Three Hundred Twenty Only	1600.00
x	Jonting the 1.1KV grade 3 core 4 Sq. mm Flat type copper Cable	5.000	Nos		193.00	Rupees One Hundred NinetyThree Only	965.00
xi	Jonting the 1.1KV grade 3 core 6 Sq. mm Flat type copper Cable	2.000	Nos		259.00	Rupees Two Hundred FiftyNine Only	518.00
xii	Jonting the 1.1KV grade 3 core 10 Sq. mm Flat type copper Cable	2.000	Nos		452.00	Rupees Four Hundred FiftyTwo Only	904.00
<b>5) a</b>	<b>Repairing/ reconditioning of Sluice valve (for line valve/ for Scour valve) including all material, labour (Specify type of sluice valve and type of repair to be carried out)</b>						
i	300 mm CI Sluice valve	1.000	Nos		8000.00	Rupees Eight Thousand Only	8000.00
ii	250 mm CI Sluice valve	1.000	Nos		5500.00	Rupees Five Thousand Five Hundred Only	5500.00
iii	250 mm CI NRV valve	1.000	Nos		9000.00	Rupees Nine Thousand Only	9000.00
iv	100 mm CI Sluice valve	1.000	Nos		2750.00	Rupees Two Thousand Seven Hundred Fifty Only	2750.00
v	100 mm CI NRV valve	1.000	Nos		3000.00	Rupees Three Thousand Only	3000.00
vii	300 mm CI Sluice valve	1.000	No		8000.00	Rupees Eight Thousand Only	8000.00
vii	250 mm CI Sluice valve	1.000	No		5500.00	Rupees Five Thousand Five Hundred Only	5500.00
viii	200 mm CI Sluice valve	1.000	No		4250.00	Rupees Four Thousand Two Hundred Fifty Only	4250.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
ix)	100 mm CI Sluice valve	1.000	No		2750.00	Rupees Two Thousand Seven Hundred Fifty Only	2750.00
x	100 mm CI NRV valve	1.000	No		3000.00	Rupees Three Thousand Only	3000.00
<b>5) b</b>	<b>Supply, delivery and fixing of following size of Gate valves in OHT's</b>						
i	40 mm Gate Valve	1.000	No		1296.00	Rupees One Thousand Two Hundred NinetySix Only	1296.00
ii	50 mm Gate valve	1.000	No		2062.00	Rupees Two Thousand SixtyTwo Only	2062.00
iii	65 mm Gate valve	1.000	No		3157.00	Rupees Three Thousand One Hundred FiftySeven Only	3157.00
iv	80 mm Gate valve	1.000	No		5113.00	Rupees Five Thousand One Hundred Thirteen Only	5113.00
v	100 mm Gate valve	1.000	No		8592.00	Rupees Eight Thousand Five Hundred NinetyTwo Only	8592.00
j)	Supply and delivery Power capacitor for power factor improvement with oil filled with discharge resistance 3 phase 415/440V 50 HZ conforming to ISS:2834 with ISI marking	50.000	KVAR	Special Specifications	315.00	Rupees Three Hundred Fifteen Only	15750.00
6	<b>Removal of sediments and deposition of sludge, silt, Particles inside the sump at various capacities by engaging required labours and diesel pumpsets and cleaning the side wall using wire brushes, brooms, collecting , lifting of the deposited slit particles on above the sump and washing side wall and the slab using bleaching powder etc., complete and as directed by TWAD Board officers</b>			Special Specifications			

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
i	8.00 LL capacity of sump @ Collection Sump at seevalaperi	1.000	Nos		15500.00	Rupees Fifteen Thousand Five Hundred Only	15500.00
ii	8.00 LL capacity of sump @ Kayathar	1.000	Nos		15500.00	Rupees Fifteen Thousand Five Hundred Only	15500.00
iii	7.00 LL capacity of sump @ Savalaperi	1.000	Nos		14000.00	Rupees Fourteen Thousand Only	14000.00
iv	10.00 LL capacity of SR @ NAlatinpudur	1.000	Nos		15500.00	Rupees Fifteen Thousand Five Hundred Only	15500.00
v	2.50 LL capacity of sump @ Vellalankottai	3.000	No		11000.00	Rupees Eleven Thousand Only	33000.00
vi	2.50LL Capacity of Sump @ Kalankaraipatti	3.000	No		11000.00	Rupees Eleven Thousand Only	33000.00
vii	1.00 LL capacity of sump @ Ayanaaroothu	3.000	No		7000.00	Rupees Seven Thousand Only	21000.00
viii	1.00LL capacity of sump @ Melaparaipatti	3.000	No		7000.00	Rupees Seven Thousand Only	21000.00
ix)	1.00LL capacity of sump @ Kalapaipatti	3.000	No		7000.00	Rupees Seven Thousand Only	21000.00
x	0.60 LL capacity of sump @ Chidamparampatti	3.000	No		7000.00	Rupees Seven Thousand Only	21000.00
xi	0.60LL capacity of sump @ Thonugal	2.000	No		7000.00	Rupees Seven Thousand Only	14000.00
xii	0.30 LL capacity of sump @ Chettikurichi	4.000	No		3500.00	Rupees Three Thousand Five Hundred Only	14000.00
xiii	0.30 LL capacity of sump @ Ahilanadapuram	3.000	No		3500.00	Rupees Three Thousand Five Hundred Only	10500.00
xiv)	0.30LL capacity of sump @ Ketchilapuram Vilakku	2.000	No		3500.00	Rupees Three Thousand Five Hundred Only	7000.00

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Contractor

Superintending Engineer, TWAD

Sl. No	Description of work	Quantity		TNBP No. Other specification	Rate		Amount Rs.
					in figures	in words	
xv	0.3LL Capacity of sump @ Kalugasalapuram	3.000	No		3500.00	Rupees Three Thousand Five Hundred Only	10500.00
xvi	0.15LL Capacity of sump @ Kumareddiapuram	3.000	No		3500.00	Rupees Three Thousand Five Hundred Only	10500.00
xvii	4.00LL SR at Nalatinpudur	4.000	No		12500.00	Rupees Twelve Thousand Five Hundred Only	50000.00
xviii	4.00LL SR at Manthithoppu	4.000	No		12500.00	Rupees Twelve Thousand Five Hundred Only	50000.00
<b>7</b>	Desilting light or sandy soil or silt from infiltration wells below water level including the charges for special tools and plants and air compressor etc.complete and as directed by the TWAD Board Officers.	15.900	m3	Special Specifications	1834.70	Rupees One Thousand Eight Hundred ThirtyFour Paise Seventy Only	29171.73
	<b>Grand Total</b>						<b>8524768.60</b>



**Schedule - A2**

**NAME OF WORK : OPERATION AND MAINTENANCE OF CWSS TO SINDALAKKARAI CWSS IN KOVILPATTI AND VILATHIKULAM UNION**

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
<b>1</b>	Operation and Maintenance of the Electro Mechanical installations, equipments, components, pipelines valves and appurtenances, water retaining structures including protecton of all schemee components from damages/ theft undertaking legal actions for such untoward incidents, preventive maintenance, disinfection and deliverance of water <b>0.074 MLD</b> as per quality standards and supply of earmarked quantity of water to the beneficiaries as per Annexure carrying out the O&M as per standard operating procedures, Acts and rules in force etc., complete and as directed by TWAD Board Officers and excluding cost towards attending leak, burst repair and replacement works to electro mechanical installations consumables for disinfection of water, cleaning of all water retaining structure, electricity - <b>19.166ML (0.074 x 259)</b>	19.166 ML	Special Specifications	31739.12	Rupees ThirtyOne Thousand Seven Hundred ThirtyNine Paise Twelve Only	608311.97

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
2	<b>Attending burst occurred in all the size, class and material of pipes in all the pipelines of this CWSS for the following items <i>with replacing the pipes</i> round the clock as per the standard specifications including earthwork excavation ,removal of slushy soil , labour charges, civil works, cost of materials, dewatering , genset, welding unit,and providing night lamps, barrigading arrangements, caution sign boards ,traffic diversion arrangements and all other incidental charges, etc complete within the stipulated time limit as specified in Clause 2.2.5 of General conditions of Contract Part II and as directed by TWAD Board officers</b>					
i)	Earth work excavation and depositing on bank in hard stiff clay, stiff black cotton soil, hard red earth, shales, murrums, ordinary gravel stoney earth mixed with small sized boulders etc., for leak rectification works for the following sizes of Pipes and as directed by TWAD Bd. Officers		SS 20 B,23, 95 and Special specifications			
a	For PVC Pipes of various classes	9.987 m3		96.60	Rupees NinetySix Paise Sixty Only	964.74
ii)	Supply and delivery of the following sizes of PVC pipes confirming to IS specifications including transportation to any where in Tamilnadu etc., complete and as directed by TWAD Board Officers		IS 4985/2000 and special specification			
a	63mm PVC 4KSC	1.800 m		78.50	Rupees SeventyEight Paise Fifty Only	141.30
b	75mm PVC 4KSC	2.000 m		109.00	Rupees One Hundred Nine Only	218.00
c	90mm PVC 4 KSC	1.800 m		151.00	Rupees One Hundred FiftyOne Only	271.80
d	110mm PVC 4 KSC	1.800 m		216.50	Rupees Two Hundred Sixteen Paise Fifty Only	389.70

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
iii)	Supply and delivery of following sizes of PVC Specials confirming to IS specifications including transportation charges anywhere in Tamilnadu etc., complete and as directed by TWAD Board Officers		IS 10124/1982 Part - II and special specification			
a	63 mm PVC Coupler Fabricated 4 KSC	2.000 Nos		22.00	Rupees TwentyTwo Only	44.00
b	75 mm PVC Coupler Fabricated 4 KSC	2.000 Nos		34.00	Rupees ThirtyFour Only	68.00
c	90 mm PVC Coupler Fabricated 4 KSC	2.000 Nos		50.00	Rupees Fifty Only	100.00
d	110mm PVC Coupler Fabricated 4 KSC	2.000 Nos		77.00	Rupees SeventySeven Only	154.00
iv)	Removing following the burst Pipes from the pipe line and removal of slushy soil and baling out water and replacing the pipe line with sound pipe including jointing and cost of refilling the pipe line with water for retesting the pipe line etc complete (excluding cost of sound pipe and jointing materials and earth work) and as directed by the TWAD Board Officers		Special Specifications			
a	63mm PVC 4KSC	1.000 Nos		339.90	Rupees Three Hundred ThirtyNine Paise Ninety Only	339.90
b	75mm PVC 4KSC	1.000 Nos		426.80	Rupees Four Hundred TwentySix Paise Eighty Only	426.80
c	90mm PVC 4 KSC	1.000 Nos		568.30	Rupees Five Hundred SixtyEight Paise Thirty Only	568.30
d	110mm PVC 4 KSC	1.000 Nos		690.10	Rupees Six Hundred Ninety Paise Ten Only	690.10

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
<b>3.a )</b>	<b>Carrying out the following repair works occurring during the maintenance period in the Electrical, Mechanical and Elctro-mechanical items to bring back the scheme / components into normal running condition as per standard specification including all labour charges, cost of materials and all incidental charges within the stipulated time limit etc., complete as specified in Clause 2.8 of General conditions of Contract Part II etc as directed by TWAD Board officers</b>		Special Specification			
i)	Rewinding of motor and reconditioning pump and repair works to 3 HP Vertical Borewell Pump set (150 lpm x 40M) including cost of all material ,conveyance ,labour charges for removing and re-erection of Submersible Pumpeset at Headworksite - 1 Nos	1.000 Nos		20500.00	Rupees Twenty Thousand Five Hundred Only	20500.00
<b>3) b</b>	<b>Repair and reconditioning of starter</b>		Special Specification			
i	Supply and delivery of 12 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000 Nos		961.00	Rupees Nine Hundred SixtyOne Only	961.00
ii	Supply and delivery of 25 Amps\440V Electro magnetic Contactors Suitable for Starter in AC Three Phase rating Conforming to IS/IEC 60947-4-1	1.000 Nos		3558.00	Rupees Three Thousand Five Hundred FiftyEight Only	3558.00
iii)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 5A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000 Nos		1311.00	Rupees One Thousand Three Hundred Eleven Only	1311.00
iv)	Supply and delivery of Directly operated Bimetallic Thermal overload relay Upto 5A-10A which operates in case of overload and also in case of under voltage with manual and auto reset mode	1.000 Nos		1321.00	Rupees One Thousand Three Hundred TwentyOne Only	1321.00

Contractor

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Superintending Engineer, TWAD

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
v)	Electric Motor protection device against single phasing. The device should protect the motor against single phasing, reverse phasing and unbalance supply. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply	1.000 Nos		1152.00	Rupees One Thousand One Hundred FiftyTwo Only	1152.00
vi	Electric Motor protection device against dry running. The device should protect the motor against Dry running. The device should be suitable for any device and have provisions for mounting in panel boards. Operate without need of any auxiliary supply	1.000 Nos		1613.00	Rupees One Thousand Six Hundred Thirteen Only	1613.00
<b>3) c</b>	Supply and delivery Power capacitor for power factor improvement with oil filled with discharge resistance 3 phase 415/440V 50 HZ conforming to ISS:2834 with ISI marking	4.000 KVAR	Special Specification	461.00	Rupees Four Hundred SixtyOne Only	1844.00
<b>3) d</b>	<b>Replacement of 32-400 Amps 4 Pole MCCB Switch in the Head works and other pumphrooms</b>		Special Specification			
i	32 Amps 4 Pole MCCB	1.000 Nos		12788.00	Rupees Twelve Thousand Seven Hundred EightyEight Only	12788.00
<b>4</b>	<b>Supply, delivery and fixing of following size of Gate valves in OHT's</b>		IS BS 5154 and related IS specifications			
i)	50 mm Gate valve	1.000 Nos		2062.00	Rupees Two Thousand SixtyTwo Only	2062.00
ii)	65 mm Gate valve	1.000 Nos		3157.00	Rupees Three Thousand One Hundred FiftySeven Only	3157.00

Sl. No	Description of work	Quantity	TNBP No. Other specification	Rate		Amount Rs.
				in figures	in words	
5	Removal of sediments and deposition of sludge, silt, Particles inside the sump at various capacities by engaging required labours and diesel pumpsets and cleaning the side wall using wire brushes, brooms, collecting , lifting of the deposited slit particles on above the sump and washing side wall and the slab using bleaching powder etc., complete and as directed by TWAD Board officers		Special Specification			
i	0.10 LL capacity of sump @ Sinthalakarai	1.000 Nos		2500.00	Rupees Two Thousand Five Hundred Only	2500.00
ii	0.30 LL capacity of sump @ Muthulapuram	1.000 Nos		3500.00	Rupees Three Thousand Five Hundred Only	3500.00
	<b>Grand Total</b>					<b>668955.62</b>

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Superintending Engineer, TWAD