



NATIONAL IRRIGATION ADMINISTRATION

Annex "E"

MC No. 69, s. 2018

SUMMARY OF CY 2018 PROGRAM OF WORK

| | | | |
|-------------------------------------|--|-------------|---|
| REGION / PMO | IV-A / Laguna-Rizal Management Office | Program No. | : |
| PROJECT TITLE | : CIS EXTENSION CY 2019 | Date | : |
| NAME OF SYSTEM / PROJECT | : KAY MANGGA COMMUNAL IRRIGATION SYSTEM | | |
| SYSTEMS CATEGORY (NIS/CIS, NIS RIP) | : COMMUNAL IRRIGATION SYSTEM | | |
| PROJECT DESCRIPTION | : CONSTRUCTION OF CONCRETE CANAL LINING, PUMP & ENGINE, PUMP SUMP, PIPELINE AND PROTECTION WORKS | | |

| | | | | | |
|--|--------------------------|--------------------------------------|---------------|---------|------|
| I. GENERAL INFORMATION | | | | | |
| 1. Project Location | | 6. Overall Project Cost (P) | Original | Revised | |
| a. Region | IV-A | a. GOP | 2,507,804.10 | | |
| b. Province / City / Municipality / District | Rizal BINANGONAN I | b. Loan proceeds | | | |
| 2. Service Area / Designed area (ha.) | 7.60 (NEW) | c. Others (Equity, etc.) | | | |
| 3. Source of Water | | TOTAL | 2,507,804.10 | | |
| 3.a Drainage Area | | 7. Physical Target (Overall) | | | |
| 3.b Dependable Flow | | a. New Area (Ha) | 7.60 (NEW) | | |
| 4. Type of Irrigation (Pls check the type of Irrigation) | | b. Restored Area (Ha) | | | |
| 5. PT of Diversion | | c. Repair Works (specific for rehab) | | | |
| Latitude | 14°30'37.89"E | c.1 Earth Canal (km) | | | |
| Longitude | 121°12'30.13"E | c.2 Lined canal (km) | | | 0.21 |
| a. Run off the River | X | c.3 Structures(units) | | | |
| b. Reservoir | | c.4 Coconet Slope Prot.(sqm) | | | |
| c. Ground Water Pump | | c.5 Concrete Service Roads(km) | | | |
| d. Others | | c.6 Earth/gravel Roads (km) | | | |
| | | c.7 Rehab area, Ha (attribution) | | | |
| | | PIPELINE (km) | | | 0.20 |
| | | 8. Overall Implementation Schedule | | | |
| | | a. Physical Starting Date | Original | Revised | |
| | | b. Completion Date | January, 2019 | | |
| | | | April, 2019 | | |

| | | | |
|---|---------------|--------------------------------------|------|
| II. WORK TO BE DONE (For the current year) | | | |
| 1. Performance Weight | | 4. Physical Target | |
| a. CONTRACT WORKS | 57.37% | a. New Area (Ha) | |
| b. FORCE ACCOUNT WORKS | | b. Restored Area (Ha) | |
| b-1) IDP | 2.00% | c. Repair Works (specific for rehab) | |
| b-2) Construction Survey | 0.33% | c.1 Earth Canal (km) | |
| c. FSSM | 3.00% | c.2 Lined canal (km) | 0.21 |
| TOTAL | 62.70% | c.3 Structures(units) | |
| 2. Starting Date: | January, 2019 | c.4 Coconet Slope Prot.(sqm) | |
| 3. No. of days to Complete | 120 Days | c.5 Concrete Service Roads(km) | |
| | | c.6 Earth/gravel Roads (km) | |
| | | c.7 Rehab area, Ha (attribution) | |

| | | | | | |
|--|------------------------------------|-----------------------|------------------------------------|---|--|
| III. BREAKDOWN OF CURRENT YEAR PROGRAM | | | | Prepared by: | |
| DIRECT COST | Field Office | Central Office | Total | LOUIE ERVIN L. VILLASIN Eng'g Assistant A | |
| I. CONTRACT WORKS | | | | Checked by: | |
| 1. CIVIL WORKS | 2,294,697.21 | | 2,294,697.21 | ARMANDO L. FLORES Senior Engineer A | |
| II. FORCE ACCOUNT WORKS | | | | Approved by: | |
| 1. INSTITUTIONAL DEV'T PROGRAM | 48,000.00 80,000.00 | | 48,000.00 80,000.00 | CHARLIE D. IBARROLA Division Manager - LRIMO | |
| 2. CONSTRUCTION SURVEY | 13,106.89 | | 13,106.89 | Noted by: | |
| III. FIELD SUPPORT, SUPERVISION & MONITORING | 120,000.00 70,000.00 | | 120,000.00 70,000.00 | ROMEO M. LOPEZ Acting Regional Manager | |
| IV. PROCUREMENT OF EQUIPMENT & VEHICLES (for FAPs) | | | | Noted by: | |
| V. RIGHT OF WAY ACQUISITION/ DAMAGES | | | | DELSY J. REVELLAME Acting Manager, Operations Department | |
| VI. CONSULTING SERVICES | | | | | |
| VII. TAXES (For selected FAPs) | | | | | |
| VIII. CONTINGENCIES | | | | | |
| 10. CONTINGENCIES | | | | | |
| TOTAL DIRECT COST | 2,507,804.10 2,425,804.10 | CDP-8 11/13/18 | 2,507,804.10 2,425,804.10 | | |
| IV. SOURCES OF FUNDS | SAF 2,425,800.00 | | SAF 2,425,800.00 | | |
| A. CAPITAL OUTLAY | | | | | |
| 1. GOP | | | | | |
| 2. LOAN PROCESS | | | | | |

MASTERLIST OF ITEM OF WORKS

Project Name / Location: Kay Mangga CIS / Binangonan, Rizal
under CIS EXTENSION CY 2019

Proposed Canal System, Pump Works and Structures

| Description | Station | | Length (m) | Location | Particular Item of Works | | | | | | | | | | | |
|------------------------------------|----------|----------|---------------|-------------|--------------------------|----------------|----------------------|----------------|-------------------------------|----------------|------------------------|---------------|--------------------------------------|-------------------|--------------|--------------|
| | From | To | | | Class "B" Concrete | | Class "A" Concrete - | | Class "A" Concrete - Ordinary | Accessories MC | Trash Rack (1.5m x 2m) | Pump & Engine | 0.225m ϕ x 6m HDPE Pipe - SDR21 | Manual Excavation | Backfill | |
| | | | | | Flooring | Side Wall & TB | Flooring | Side Wall / TB | | | | | | | Side Borrow | Haul Borrow |
| | | | | | (cu.m.) | (cu.m.) | (cu.m.) | (cu.m.) | | | | | | | (cu.m.) | (cu.m.) |
| 1. Proposed Pump Sump MC | | | | MC | | | | | 1.00 | 1.00 | | 4.50 | | | | |
| 2. Proposed Pedestal | | | | MC | | | | 0.15 | | | | 0.11 | 0.09 | | | |
| 3. Proposed Pipe Line | 0+000.00 | 0+196.00 | | MC | | | | | | | 33.00 | 49.00 | 39.20 | | | |
| 4. Proposed Water Tank | 0+196.00 | | | MC | | | | 1.01 | | | | 0.90 | | | | |
| 5. Proposed Pump & Engine # 2 | 0+000.00 | | | MC | | | | | | 1.00 | | | | | | |
| 11. Proposed Concrete Canal Lining | 0+000.00 | 0+050.00 | 50.00 | MC (left) | 3.64 | 5.40 | | | | | | 2.40 | 2.40 | 16.08 | | |
| 12. Proposed Concrete Canal Lining | 0+050.00 | 0+070.00 | 20.00 | MC (left) | 1.46 | 2.16 | | | | | | 1.10 | 1.10 | 3.03 | | |
| 13. Proposed Concrete Canal Lining | 0+070.00 | 0+090.00 | 20.00 | MC (left) | | | 1.46 | 2.16 | | | | 0.60 | 0.60 | 2.48 | | |
| 14. Proposed Concrete Canal Lining | 0+090.00 | 0+108.00 | 18.00 | MC (left) | 1.31 | 1.95 | | | | | | 0.54 | 0.54 | 2.23 | | |
| 15. Proposed Concrete Canal Lining | 0+000.00 | 0+020.00 | 20.00 | MC (right) | 1.46 | 2.16 | | | | | | 0.60 | 0.60 | 1.05 | | |
| 16. Proposed Concrete Canal Lining | 0+020.00 | 0+050.00 | 30.00 | MC (right) | | | 2.18 | 4.02 | | | | 0.90 | 0.90 | 3.06 | | |
| 17. Proposed Concrete Canal Lining | 0+050.00 | 0+100.00 | 50.00 | MC (right) | 3.64 | 5.40 | | | | | | 1.80 | 1.80 | 5.13 | | |
| 18. Proposed Catch Basin | | | | MC (L & R) | | | 0.44 | 1.09 | | | | 0.72 | | | | |
| TOTAL | | | 208.00 | | 11.51 | 17.07 | 4.08 | 7.27 | 1.16 | 1.00 | 1.00 | 1.00 | 33.00 | 63.17 | 47.23 | 33.06 |

KAY MANGGA CIS
DETAILED BREAKDOWN
COST AND QUANTITIES DETAILED BREAKDOWN
 Under CIS EXTENSION CY 2019
 Binangonan, Rizal

Annex "E"

ATTACHMENT "D"

| ACTIVITY | Unit | WORK TO BE DONE | | | | | | | | |
|--|------|-----------------|-----------------------|----------------------|---------------|-----------|-----------|------------|----------------------|----------------------|
| | | Quantity | Estimated Direct Cost | | Indirect Cost | | | TOTAL | | |
| | | | Unit Cost | Total EDC | OCM | Profit | Vat | Total | Unit Cost | Project Cost |
| A. DIRECT COST | | | | | | | | | | |
| I. CIVIL WORKS | | | | | | | | | | |
| 1. Proposed Canal System, Pump Works and Structures | | | | | | | | | | |
| a. Class "B" Concrete Flooring | cu.m | 11.51 | 9,261.64 | 106,601.48 | 1,389.25 | 926.16 | 578.85 | 2,894.26 | 12,155.90 | 139,914.41 |
| b. Class "B" Concrete Wall & TB | cu.m | 17.07 | 11,690.65 | 199,559.40 | 1,753.60 | 1,169.07 | 730.67 | 3,653.34 | 15,343.99 | 261,921.91 |
| c. Class "A" Concrete Flooring | cu.m | 4.08 | 10,802.66 | 44,074.85 | 1,620.40 | 1,080.27 | 675.17 | 3,375.84 | 14,178.50 | 57,848.28 |
| d. Class "A" Concrete Wall & TB | cu.m | 7.27 | 13,445.27 | 97,747.11 | 2,016.79 | 1,344.53 | 840.33 | 4,201.65 | 17,646.92 | 128,293.11 |
| e. Class "A" Concrete - Ordinary | cu.m | 1.16 | 13,308.88 | 15,438.30 | 1,996.33 | 1,330.89 | 831.81 | 4,159.03 | 17,467.91 | 70,262.78 |
| g. Accessories MC | ls | 1.00 | 351,845.04 | 351,845.04 | 52,776.76 | 35,184.50 | 21,990.32 | 109,951.58 | 461,796.62 | 481,796.62 |
| h. Trash Rack (1.5m x 2m) | ls | 1.00 | 4,682.56 | 4,682.56 | 702.38 | 468.26 | 292.66 | 1,463.30 | 6,145.86 | 6,145.86 |
| i. Pump & Engine | ls | 1.00 | | | | | | | | |
| n. 0.225m Ø x 6m HDPE Pipe - SDR21 | pcs | 33.00 | 13,737.94 | 453,352.02 | 2,060.69 | 1,378.79 | 858.62 | 4,293.11 | 513,000.00 | 513,000.00 |
| o. Manual Excavation | cu.m | 63.17 | 149.20 | 9,424.96 | 22.38 | 14.92 | 9.33 | 46.63 | 195.83 | 12,370.58 |
| p. Side Borrow | cu.m | 47.23 | 198.93 | 9,395.46 | 29.84 | 19.89 | 12.43 | 62.16 | 261.09 | 12,331.28 |
| q. Haul Borrow | cu.m | 33.06 | 1,977.08 | 65,362.26 | 296.56 | 197.71 | 123.57 | 617.84 | 2,594.92 | 85,788.06 |
| Total CONTRACT WORKS | | | | | | | | | 2,294,697.21 | |
| II. FORCE ACCOUNT WORKS | | | | | | | | | | |
| 1 Civil Works (Breakdown of Activities) | | | | | | | | | | |
| 2 Institutional Development Program | L.S. | 1.00 | 48,000.00 | 48,000.00 | | | | | 48,000.00 | 48,000.00 |
| 3 Construction Survey (with support doc.) Parcelly Survey (with support doc.) | L.S. | 1.00 | 13,106.89 | 13,106.89 | | | | | 13,106.89 | 13,106.89 |
| Total FORCE ACCOUNT WORKS | | | | | | | | | 61,106.89 | |
| III. RIGHT OF WAY ACQUISITION/DAMAGES | | | | | | | | | | |
| 1 Land Acquisition | | | | | | | | | | |
| 2 Plant Damages | | | | | | | | | | |
| 3 Property Damages | | | | | | | | | | |
| IV. PROCUREMENT OF EQUIPMENT & VEHICLES | | | | | | | | | | |
| V. FIELD SUPPORT, SUPERVISION & MONITORING | L.S. | 1.00 | 70,000.00 | 70,000.00 | | | | | 70,000.00 | 70,000.00 |
| VI. CONSULTING SERVICES | | | | | | | | | | |
| VII TAXES | | | | | | | | | | |
| VII TAXES | | | | | | | | | | |
| VII CONTINGENCIES | | | | | | | | | | |
| 1 Physical Contingency | | | | | | | | | | |
| 2 Financial Contingency | | | | | | | | | | |
| TOTAL DIRECT COST | | | | | | | | | 2,307,804.10 | |

CDP-8 11/13/18

CDP-8 11/13/18

CDP-8 11/13/18

CDP-8 11/13/18

CDP-8 11/13/18

2,425,804.10
 SA 2,425,800.00