



DELIBERASAUN N. 47B/IV/CAFI/2025

Conselho de Administração do Fundo das Infraestruturas – CAFI, baseia ba artigo 10º (1) e (3) DL Nº. 25/2024, de 22 de maio, Primeira Alteração ao DL Nº.13/2016, 18 de Maio, realiza reuniaun Extraordinária iha loron Quinta-feira, 24 de abril de 2025, e halo deliberasaun ba assunto tuir mai ne'e:

Asuntu: Pedidu aprovasaun no konfirmasaun Finansiamentu iha FI 2025 ba Projetu:

1. *Rehabilitation of Liquiça Urban Road;*
2. *Road Improvement Section2: Ainaro Urban Road L= 24.226km, Município Ainaro;*
3. *National Road, Maliana-Cailaco-Marobo Bridge (26Km), Bobonaro Municipality.*

Proponente: Ministério das Obras Públicas – MOP

Notas/justifikasiakaun:

- Bazeia ba despacho husi Ministro do MPIE ho karta no. Ref.: 670/CG-GMPIE/IV/2025, data 24de Abril de 2025, ba karta pedidu husi Sua Exceléncia Ministro Obras Publicas Sr. Samuel Marçal, ho karta no. Ref.: 598/GAB.MOP/IV/2025, data 23 de Abril de 2025, ho asuntu: Pedido Agendamento CAFI;
- Bazeia ba karta husi ADN, I.P. ho no.ref.: 0912/ADN,I.P./VI/2025, data 3 de junho de 2025, ho asuntu Rezulta Re-verifikasiakaun – Projeto Estarda no Ponte;
- Desizaun kona ba abertura ka inisiasiakaun prosesu aprovisionamentu bazeia, Artigo 24 & 25, Decreto Lei No.43/2024, de 20 de Dezembro, regra ezekusaun OGE 2025;
- DL Nº. 25/2024, de 22 de maio, Primeira Alteração ao DL Nº.13/2016, 18 de Maio, kona ba Regulamentu Fundo da Infraestrutura, determina katak aprovisionamento projetu FI nian sei lao tuir Regime Juridiku Aprovizionamento em vigor. Modalidade aprovisionamento sei lao tuir Regime Juridiku Aprovizionamento em vigor;
- Dono do projetu sei assume responsabilidade hodi assegura orsamentu ba Ezekusaun no Implementasaun projetu;
- MOP nudar Projetu nain sei asume responsabilidade ba koordenasaun entre entidade relevantes ba implementasaun projetu ne'e, e ba supervizaun, monitorizasaun e akompanhamentu ba projetu ne'e iha faze implementasaun, e sei garante kualidade servisu konstrusaun nian tuir espesifikasiakaun nebe aprova ona;
- Lista Proposta:



IX GOVERNO CONSTITUCIONAL
MINISTÉRIO DO PLANEAMENTO E INVESTIMENTO ESTRATÉGICO
FUNDO DAS INFRAESTRUTURAS



**Conselho de
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No.	Naran projetu	Verifikasiadun ADN,I.P. Kustu estimativa	Alokasaun orsamentu iha FI 2025
1	Rehabilitation of Liquiça Urban Road	\$ 19,826,875.03;	<ul style="list-style-type: none"> Alokasaun FI 2025 : \$ 500,000.00 Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; Kodigo atividade 02605F7: Rehabilitasaun Estrada Urbana Liquica.
2	Road Improvment Section2: Ainaro Urban Road L= 24.226km, Municipio Ainaro;	\$ 22,396,917.38 no.ref.: 0912/ADN,I.P./VI/2025, data 3 de junho de 2025	<ul style="list-style-type: none"> Alokasaun FI 2025 : \$ 500,000.00 Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; Kodigo atividade 02605E6: Rehabilitasaun Estrada Urbana Ainaro.
3	National Road, Maliana-Cailaco-Marobo Bridge (26Km), Bobonaro Municipality.	\$25,610,793.14 no.ref.: 0912/ADN,I.P./VI/2025, data 3 de junho de 2025	<ul style="list-style-type: none"> Alokasaun FI 2025 : \$ 500,000.00 Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; Kodigo atividade 0260911: Novo Construsaun das Estradas Nacional, Road Maliana to Cailaco to Marobo Bridge, (Hatulia - Cailaco - Maliana) A11 - 26 Km.

Rekomendasau:

- 1) CAFI atu aprova no konfirma finasiamentu ba Projetu **Rehabilitation of Liquiça Urban Road, Road Improvment Section2: Ainaro Urban Road L= 24.226km, Municipio Ainaro no National Road, Maliana-Cailaco-Marobo Bridge (26Km), Bobonaro Municipality**, bazeia ba pedidu husi Ministério das Obras Públicas – MOP;
- 2) Refere ba lista proposta, CAFI konfirma disponibilidade orsamentu iha FI tinan 2025, molok CdM autoriza despezas bazeia alinea 1 (a) Artigo 5º Dekreto Lei 23/2022, de 19 de Maio, Competência Para a Autorização de Despesa;
- 3) Ministério das Obras Públicas – MOP nudar projetu nain sei apresenta ba Conselho de Ministro hodi hetan autorizasaun despezas, bainhira CAFI konfirma ona finansiamentu;
- 4) Desizaun kona ba abertura ka inisiasaun prosesu aprovisionamento bazeia, Artigo 24 & 25, Decreto Lei No.43/2024, de 20 de Dezembro, regra ezekusaun OGE 2025;
- 5) DL N°. 25/2024, de 22 de maio, Primeira Alteração ao DL N°.13/2016, 18 de Maio, kona ba Regulamentu Fundo da Infraestrutura, determina katak aprovisionamento projetu FI nian sei lao tuir Regime Juridiku Aprovizionamento em vigor. Modalidade aprovizionamento sei lao tuir Regime Juridiku Aprovizionamento em vigor;

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IX GOVERNO CONSTITUCIONAL
MINISTÉRIO DO PLANEAMENTO E INVESTIMENTO ESTRATÉGICO
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- 6) Modalidade aprovisionamento bazeia ba kustu projetu no sei lao tuir Decreto-Lei No.22/2022 de 11 de Maio;
- 7) Projetu nain sei assume responsabilidade hodi assegura orsamentu ba Ezekusaun no Implementasaun projetu;
- 8) Projetu nain sei assume responsabilidade ba koordenasau entre entidade relevantes ba implementasaun projetu ne'e, e ba supervizaun, monitorizasaun e akompanhamentu ba projetu ne'e iha faze implementasaun, e sei garante kualidade servisu konstrusaun nian tuir espesifikasi saun nebe aprova ona.

Desizaun:

1. CAFI aprova no konfirma finasiamentu ba Projetu *Rehabilitation of Liquiça Urban Road, Road Improvement Section2: Ainaro Urban Road L= 24.226km, Municipio Ainaro no National Road, Maliana-Cailaco-Marobo Bridge (26Km), Bobonaro Municipality*, bazeia ba pedidu husi Ministério das Obras Públicas – MOP;
2. Refere ba lista propopsta, CAFI konfirma disponibilidade orsamentu iha FI tinan 2025, molok CdM autoriza despezas bazeia alinea 1 (a) Artigo 5º Dekreto Lei 23/2022, de 19 de Maio, Competência Para a Autorização de Despesa;
3. Ministério das Obras Públicas – MOP nudar projetu nain sei apresenta ba Conselho de Ministro hodi hetan autorizasaun despezas, bainhira CAFI konfirma ona finansiamentu;
4. Desizaun kona ba abertura ka inisiasau prosesu aprovisionamento bazeia, Artigo 24 & 25, Decreto Lei No.43/2024, de 20 de Dezembro, regra ezekusaun OGE 2025;
5. DL N°. 25/2024, de 22 de maio, Primeira Alteração ao DL N°.13/2016, 18 de Maio, kona ba Regulamentu Fundo da Infraestrutura, determina katak aprovisionamento projetu FI nian sei lao tuir Regime Juridiku Aprovizionamento em vigor. Modalidade aprovisionamento sei lao tuir Regime Juridiku Aprovizionamento em vigor;
6. Modalidade aprovisionamento bazeia ba kustu projetu no sei lao tuir Decreto-Lei No.22/2022 de 11 de Maio
7. Projetu nain sei assume responsabilidade hodi assegura orsamentu ba Ezekusaun no Implementasaun projetu;
8. Projetu nain sei assume responsabilidade ba koordenasau entre entidade relevantes ba implementasaun projetu ne'e, e ba supervizaun, monitorizasaun e akompanhamentu ba projetu ne'e iha faze implementasaun, e sei garante kualidade servisu konstrusaun nian tuir espesifikasi saun nebe aprova ona.
9. Lista Aprovasaun:

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IX GOVERNO CONSTITUCIONAL
MINISTÉRIO DO PLANEAMENTO E INVESTIMENTO ESTRATÉGICO
FUNDO DAS INFRAESTRUTURAS



**Conselho de
Administração**

Naran projetu	Verifikasi saun ADN,I.P. Kustu estimativa /Referensia	Alokasaun orsamentu iha FI 2025	Orgaun Kompetenti Autoriza despezas – DL no. 23/2022, 19 de maio	
			Konfirma	Autoriza
Rehabilitation of Liquiça Urban Road	\$ 19,826,875.03;	<ul style="list-style-type: none"> • Alokasaun FI 2025 : \$ 500,000.00 • Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; • Kodigo atividade 02605F7: Rehabilitasaun Estrada Urbana Liquica. 	CAFI: Konfirma Finansiamentu	CdM: alinea 1 (a) Artigo Artigo 5.º Competência para a autorização da despesa.
Road Improvement Section2: Ainaro Urban Road L= 24.226km, Municipio Ainaro;	\$ 22,396,917.38 no.ref.: 0912/ADN,I.P./VI/ 2025, data 3 de junho de 2025	<ul style="list-style-type: none"> • Alokasaun FI 2025 : \$ 500,000.00 • Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; • Kodigo atividade 02605E6: Rehabilitasaun Estrada Urbana Ainaro. 	CAFI: Konfirma Finansiamentu	CdM: alinea 1 (a) Artigo Artigo 5.º Competência para a autorização da despesa.
National Road, Maliana- Cailaco-Marobo Bridge (26Km), Bobonaro Municipality.	\$25,610,793.14 no.ref.: 0912/ADN,I.P./VI/ 2025, data 3 de junho de 2025	<ul style="list-style-type: none"> • Alokasaun FI 2025 : \$ 500,000.00 • Programa 026: Estradas e Pontes, Sub-Programa Estrada Nasional & Municipal; • Kodigo atividade 0260911: Novo Construsaun das Estradas Nacional, Road Maliana to Cailaco to Marobo Bridge, (Hatulia - Cailaco - Maliana) A11 - 26 Km. 	CAFI: Konfirma Finansiamentu	CdM: alinea 1 (a) Artigo Artigo 5.º Competência para a autorização da despesa.

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FUNDO DAS INFRAESTRUTURAS



Conselho de
Administração

Aprovado husi CAFI iha loron 24 de abril de 2025.

O Conselho de Administração do Fundo das Infraestruturas
O presidente,



Gastão Francisco de Sousa

Ministro do Planeamento e Investimento Estratégico



Santina José Rodrigues Ferreira Viegas Cardoso

Ministra das Finanças



Miguel Marques Gonçalves Manetelu

Ministro dos Transportes e Comunicações



Samuel Marçal

Ministro das Obras Públicas

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MINISTÉRIO DO PLANEAMENTO E INVESTIMENTO ESTRATÉGICO
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**Conselho de
Administração**

Annexo:



REPÚBLICA DEMOCRÁTICA DE TIMOR-LESTE
Ministério do Planeamento e Investimento Estratégico
Fundo das Infraestruturas

NOTA DE DESPAICHO

1. ORIGEM DO DOCUMENTO

N Ref; 598/GAB.MOP/IV/2025

Data do Documento : 23/ 04 /2025

Proveniência do Documento

GAB.MOP

2. DETALHES DO DOCUMENTO

Data Entrada do Documento: 23/ 04 /2025

Enviado ao:

1. Sr/ Mauricio Borges
2. Sr/a _____
3. Sr/a _____
4. Assessores Nacionais / Internacionais

Assunto:

Pedido Agendamento CAFI

3. INSTRUÇÃO DO DIRETOR DO SGP

Data do Despacho: 24/ 4 /2025

Para Sr/a

1. Sr/a Maria Fonseca
2. Sr/a Patrícia Figueiredo
3. Sr/a _____

Despacho:

Háre Abantu id n're

Assinatura :

Mauricio Borges



MINISTÉRIO DO PLANEAMENTO
E INVESTIMENTO ESTRATÉGICO
IX GOVERNO CONSTITUCIONAL
GABINETE DO MINISTRO



Dili, 24 de Abril de 2025

Nu. Ref : 670.../CG-GMPIE/IV/2025

Hato' o ba : Directur Executivo SGP
Sr. Mauricio Borges

Asunto : Encaminha Despacho Ministro, MPIE

Ho Respeito

Liu husi oficio ida ne'e hakarak encaminha despacho Ministro MPIE kona ba karta husi Sua Excelênciia Ministro das Obras Públicas Sr. Samuel Marçal ho assunto Pedido Agendamento CAFI no despacho Ministro iha anexo.

Despaçho Ministro : Para SGP
Agendar

Data despaçho : 04.23.2025

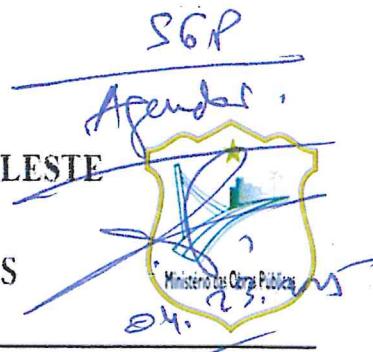
Mak ne'e deit ba atensaun, lahaluha hato'o obrigado wain.

Hau nia melhores Kumprimentos


Tomás de Fátima da Silva
Chefe do Gabinete do MPIE



REPÚBLICA DEMOCRÁTICA DE TIMOR-LESTE
IX GOVERNO CONSTITUCIONAL
MINISTÉRIO DAS OBRAS PÚBLICAS
Avenida 20 de Maio Dili, Timor-Leste



GABINETE DO MINISTRO DAS OBRAS PÚBLICAS

Dili, 23 de Abril de 2025

Ref No : 598/GAB.MOP/IV/2025

Hatoó ba : Sua Excelência Sr. Gastão Francisco de Sousa
Ministro do Planeamento e Investimento Estratégico e Presidente CAFI

Cc : Sr. Mauricio Borges
Director Secretariado dos Grandes Projetos do Fundo de Infraestruturas
(SGP)

Asunto : Pedido Agendamento CAFI

Excelência,

Refere ba asuntu iha leten, Ministerio das Obras Públicas hato'o ba Sua Exceléncia hodi bele agenda iha reuniaun Conselho de Administração do Fundo de Infraestruturas (CAFI) ba projetu hanesan lista aneksu. Nudar informasaun, projetu hirak ne'e hetan ona verifikasi saun husi Agência Desenvolvimento Nacional, IP (ADN, IP).

Maka ne'e deit, Excelência nia atensaun no serviso hamutuk la haluha hato'o obrigado wain.



Samuel Marcal
Ministro das Obras Públicas

GABINETE DO
Ministro do Planeamento e
Investimento Estratégico

RECEBIDO
DIA 23 / 4 / 2025
POR Inocência 926



REPÚBLICA DEMOCRÁTICA DE TIMOR-LESTE
IX GOVERNO CONSTITUCIONAL
MINISTÉRIO DAS OBRAS PÚBLICAS

Avenida 20 de Maio Dili, Timor -Leste



**LISTA PROJETU FUNDO DE INFRAESTRUTURA MINISTERIO DAS OBRAS PUBLICAS
NE'EBE HETAN ONA VERIFIKASAUN HUSI ADN, I.P.**

NO.	MUNICIPIO	PROJETO NARAN	MONTANTE ORSAMENTO	OBSERVASAUN
1	Bobonaro	Reabilitasaun Estradas Municipal, Bobonaro Jct - Lolotoe (8.9 Km)	\$ 13,767,998.64	Projetu foun ne'ebe tama iha planu projetu FI Ministerio das Obras Publicas tinan 2025 (026057Q - Rehabilitasaun Estradas municipal, Bobonaro Jct - Lolotoe (8.9 Km))
2	Viqueque	Reabilitasaun Estrada Viqueque - Uatucarbau Sta. 58+300 - Sta. 63+600 Package XII (Tardai/Posto Policia Irabere Canfur)	\$ 3,952,143.48	Projetu foun ne'ebe tama iha planu projetu FI Ministerio das Obras Publicas tinan 2025 (026053G - Rehabilitasaun Nacional Roads (58+300-63+600) Package XII (Tardai/Post Polisi - Irabere/Canfur))
3	Dili	Obra Konstrusaun Moru Protesaun Concrete Cyclops Mota Camea, Suco Camea, Municipio Dili	\$ 2,438,419.48	Projetu emergencia
4	Dili	Obra Konstrusaun Muru Protesaun Cyclope Left Side & Right Side Mota Ailok - Laran, Municipio Dili, Sta. 0+070 - Sta. 1+016.50 (Alinament 1 Left side and Right Side) Sta. 0+000 - Sta. 0+264.74 (Alinament 2 Left Side & Right Side)	\$ 3,585,994.07	Projetu emergencia
5	Dili	Construction Of Road Cristo-Rei Dolok Oan Junction (Package I-A, Sta.0+000 To Sta.1+000) Cristo Rei Dili Municipality, Timor Leste	\$ 4,982,548.00	Pedido husu orsamento adicional ho valor \$112,742.00 ba projetu ongoing ho numeru kontratu SSS/020/MOP-2024 (Valor kontratu original \$4,869,806.00) tamba tha servisu adicional iha terenu.
6	Bobonaro	Rehabilitation Of National Road : Maliana - Cailaco - Marobo Bridge (26 Km) Bobonaro Municipality	\$ 24,726,568.97	Projetu foun ne'ebe tama iha planu projetu FI Ministerio das Obras Publicas tinan 2025 (0260911: - Novo Construsaun das Estradas Nacional, Road Maliana to Cailaco to Marobo Bridge, (Hatulia - Cailaco - Maliana) AII - 26 Km)
7	Ainaro	Project Road Improvement Section 2 Ainaro Urban Road Length = 24.226 km Municipio Ainaro	\$ 21,017,918.07	Projetu foun ne'ebe tama iha planu projetu FI Ministerio das Obras Publicas tinan 2025 (02605E6 - Rehabilitasaun Estrada Urbana Ainaro)
8	Liquica	Rehabilitation of Liquica Urban Road	\$ 22,995,898.00	Projetu foun ne'ebe tama iha planu projetu FI Ministerio das Obras Publicas tinan 2025 (02605F7 - Rehabilitasaun Estrada Urbana Liquica)



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

Dili, 03 de Junho de 2025

Ref : 0912 /ADN, I.P./VI/2025

Hato' o ba : Sr. Eng. Aleixo Amaral do Carmo
Koordenador Unidade de Inspeção e Verificação para Pagamento – MOP

Cc : Sua Exelênci Sr. Samuel Marçal
Ministro das Obras Públicas

Asuntu : Rezultado Re-verifikasiasaun – Projeto Estrada no Ponte

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Ho Respeito,

Bazeia ba karta pedidu verifikasiasaun ho no ref: 421/UIVP-MOP/IV/2025 ho data 16 de Abril de 2025, ba asuntu ne'be mensiona iha leten, ekipa verifikasiasaun Unidade Avaliação dos Projetos – ADN, I.P. hala'o ona verifikasiasaun ba dokumentu refere. Ho nune'e bele hare rezultado re-verifikasiasaun iha (*aneksu*). Hanesan tuir mai:

1. Rehabilitation of Road of Umaboco, Viqueque Demolition & Reinstallation of Welolo Bridge, Municipality Viqueque
2. Upgrading Road Constrction Fatuhada Osindo II (Sta. 0+000-sta.0+660) Suco Bairo Pite Posto Admi Dom Aleixo, Municipality Dili
3. Rehabilitation of National Road Link JcT Lourba (Bobonaro), Atsabe, JcT Letefoho (Ermera) 48,93km
4. Rehabilitation of Road Jct Luca Raihun to Lacluta Dilor st 0+000-sta 13.938.11, Package I,Viqueque
5. New Construction Bridge, Girder Beam Suco Porlamanu to Lagoa Iratalalo Sta 8+260, Municipality Lautem
6. Consulting Service for Preparation of Detailed Engineering Design for Road Section 1 Liquica Urban Road,Sectionn 2 National (Arterial A12) Road Jct Oeleu Lourba Zulo Fatuleto District (Collector C18) Road Malina Atabae and Section 3 District (Collector C32) Road Beco (Covalima)-Lolotoe (Bobonaro),(Oeleu Fatuleto)
7. Consulting Service for Preparation of Detailed Engineering Design for Road Section 1 Liquica Urban Road,Sectionn 2 National (Arterial A12) Road Jct Oeleu Lourba Zulo Fatuleto District (Collector C18) Road Malina Atabae and Section 3 District (Collector C32) Road Beco (Covalima)-Lolotoe (Bobonaro),(Maliana Atabae)
8. Consulting Service for Preparation of Detailed Engineering Design for Road Section 1 Liquica Urban Road,Sectionn 2 National (Arterial A12) Road Jct Oeleu Lourba Zulo Fatuleto District (Collector C18) Road Malina Atabae and Section 3 District (Collector C32) Road Beco (Covalima)-Lolotoe (Bobonaro),(Beco Lolotoe)



Bedik-Hun, Fatuhad:
Díli – Timor-Leste
info@mpie.gov.tl
+670 3310 289



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

9. Provision of Consultancy Service for preparation of Detailed Engineering Design DED and Bidding Documents for Rehabilitation of National Road Maliana Cailaco Marobo Bridge (26km) Bobonaro Municipality
10. Obra Konstrusaun Estrada Urbana no Drainagem Baya Leste ba Main Roads (sta 0+000 sta 0+560) Gan 1 (sta. 0+265 sta. 0+537.89), Gang 2 (sta. 0+303 sta. 0+560), Gang 3 (sta. 0+351 sta. 0+505) & Gang Klaran (sta. 0+0025, sta 0+134), Suco Manleuana, Posto Admi, Dom Aleixo, Municipio Dili
11. Rehabilitacao da Estrada (A16) JCT Tilomar (sta 0+000 km) JCT Fohorem Vila (sta 9+975) Municipio Covalima
12. Rehabilitation and Construction of Road and Channels be'e Tuda Berlo, Suco Fatissi, Posto Administrativo Laulara, Aileu
13. Dili Road and Drainage Rehabilitation Project Juntion Metiaut to Hera Bridge Phase II
14. New Lebudeo Bridge Construction 40 meter Length Single Span, Steel Trusses Type B, Lebudeo, baclelo, laura, Aileu
15. Urban Road and Drainage Rehabilitation Gleno Town, Gleno Town Package 1, Section, 1,2,6,7,8,9,10,11,21,22,23,24,25,26,27,28,29,30,& 31,Ermera
16. Urban Road and Drainage Rehabilitation Gleno Town, Gleno Town Package 2, Section, 3,4,5,12,13,14,15,16,17,18,19,20, Municipio Ermera
17. Road Improvement Section 2 Ainaro Urban Road L=24.226 Km, Municipio Ainaro
18. Road & Drainagen Rehabilitation Project Road Section Aileu City

Ba ita bo'ot nia atensaun ami hato'o agradecimento wain no subkreve ho konsiderasaun a'as tebes.

Rui Lourenço da Costa
Diretor Executivo - ADN, I.P.



Bedik-Hun, Fatuhad:
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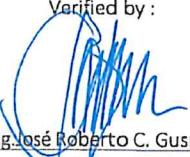
AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

SUMMARY

Project : Rehabilitation Of Liquiça Urban Road.
 No. Package : Lot 1 - Liquica Urban Road (20 Km)
 Package Name : Liquica Urban Road
 Location : Municipio Liquica
 Work Item : Final - Summary Bill of Quantities

No Item	ITEM DESCRIPTION		OWNER ESTIMATE		VERIFIED BY A.D.N.I.P	
				TOTAL AMMOUNT (USD)		TOTAL AMMOUNT (USD)
100	GENERAL		3.85	\$ 737,013.70	\$	232,495.59
200	EARTHWORKS		7.80	\$ 1,494,284.64	\$	690,162.38
300	SUBBASE AND BASE COURSE		15.92	\$ 3,050,819.73	\$	1,875,745.55
400	SURFACE COURSES		21.27	\$ 4,076,751.23	\$	5,500,292.00
500	BRIDGE CONSTRUCTION		8.17	\$ 1,564,752.32	\$	1,433,988.11
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES		30.24	\$ 5,794,751.33	\$	5,357,003.32
700	MISCELLANEOUS STRUCTURES		11.91	\$ 2,281,599.67	\$	2,246,285.82
800	BIO ENGINEERING		0.85	\$ 163,275.30	\$	114,051.57
A	CONSTRUCTION COST		100.00	\$ 19,163,247.93	\$	17,450,024.34
B	PROFIT 10 % x A		5.00	\$ 958,162.40	\$	1,745,002.43
C	OVERHEAD				\$	243,086.00
D	CONTIGENCIES 5% x A		5.00	\$ 958,162.40	\$	-
E	TAX 2% x ((A+B+C)			\$ 1,916,324.79	\$	388,762.26
F	TOTAL AMOUNT A+B+C+D+E			\$ 22,995,897.52	\$	19,826,875.03

Verified by :


 (Eng. José Roberto C. Gusmão)
 ADD, I.P. Engineer

Checked By :


 (Eng. Rogerio Marçal Pires)
 Chefe Departamento ITIAS - ADN, I.P.

Certified By :


 (Arch. José Fernando Liu Soares)
 Coordenador UAP - ADN, I.P.
 1/06/25



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

Project

Rehabilitation Of Liquiúca Urban Road.

No. Package
Package Name
Division

Lot 1 - Liquiúca Urban Road (20 Km)
Link 1 - 47
Munisipiu Liquiúca

BILL OF QUANTITY

ITEM NO.	ITEM DESCRIPTION	OWNER PURSUED				ADN VERIFIED			
		UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)	UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)
100	GENERAL								
102.1.1	Mobilization Requirement for All Contract	lump sum	1	\$ 18,060.16	\$ 18,060.16	lump sum	1.00	\$ 20,700.00	\$ 20,700.00
102.1.4	Demobilization of all contract	lump sum	1	\$ 5,418.05	\$ 5,418.05	lump sum	1.00	\$ 8,300.00	\$ 8,300.00
103	Field Officer and Facilities for the Contractor	lump sum	1	\$ 175,684.50	\$ 175,684.50	lump sum	1.00	\$ 19,075.59	\$ 19,075.59
104	Office and Accomodations for the Engineer	lump sum	1	\$ 54,420.00	\$ 54,420.00	lump sum	1.00	\$ 54,420.00	\$ 54,420.00
105	Vehicles for the Engineer (2 units)	lump sum	1	\$ 120,700.00	\$ 120,700.00	lump sum	1.00	\$ 121,000.00	\$ 121,000.00
106	Laboratory Testing Services	lump sum	1	\$ 152,400.00	\$ 152,400.00	lump sum			
108	Traffic Management and Safety	lump sum	1	\$ 6,181.00	\$ 6,181.00	lump sum			
109	Field Engineering	lump sum	1	\$ 78,150.00	\$ 78,150.00	lump sum			
114	Environmental Safeguard	lump sum	1	\$ 126,000.00	\$ 126,000.00	lump sum	1.00	\$ 9,000.00	\$ 9,000.00
	Sub Total Section 100				\$ 737,013.70				\$ 232,495.59
200	EARTHWORKS								
201(1)	Clearing and grubbing	hectare	27.00	\$ 1,067.89	\$ 28,334.94	hectare	27.00	\$ 1,219.67	\$ 32,933.16
202(1)	Removal of Structures and Obstructions (Side ditch)	Lin.m	10,165.26	\$ 8.29	\$ 84,229.34	Lin.m	10,165.26	\$ 5.56	\$ 56,510.16
203(2)a	Common Excavation	cu.m.	77,189.64	\$ 3.85	\$ 297,180.13	cu.m.	77,189.64	\$ 3.27	\$ 252,185.25
205(1)	Common Embankment	cu.m.	25,829.47	\$ 14.26	\$ 368,441.98	cu.m.	25,829.47	\$ 2.31	\$ 59,548.44
205(1)b	Back Fill	cu.m.	60,035.12	\$ 6.16	\$ 370,026.61	cu.m.	60,035.12	\$ 2.31	\$ 138,107.71
205(2)	Selected Embankment	cu.m.	6,492.06	\$ 18.88	\$ 122,602.15	cu.m.	6,492.06	\$ 7.13	\$ 46,282.16
205(3)	Granular Selected Embankment	cu.m.	3,132.72	\$ 28.12	\$ 88,099.68	cu.m.	3,132.72	\$ 7.13	\$ 22,333.30
206(1)	Subgrade preparation (Common Material)	sq.m.	132,424.51	\$ 1.02	\$ 134,869.80	sq.m.	132,424.51	\$ 0.62	\$ 81,962.21
	Sub Total Section 200				\$ 1,494,284.64				\$ 690,162.38
300	SUBBASE AND BASE COURSE								
303(1)	Aggregate Base Class A	cu.m.	25,798.13	\$ 52.50	\$ 1,354,298.73	cu.m.	25,798.13	\$ 56.95	\$ 1,469,164.92
303(2)	Aggregate Base Class B	cu.m.	33,916.56	\$ 49.98	\$ 1,693,149.54	cu.m.	33,916.56	\$ 11.96	\$ 405,691.80
304	Sand Layer	cu.m.	124.68	\$ 11.00	\$ 1,371.46	cu.m.	124.68	\$ 7.13	\$ 888.84
	Sub Total Section 300				\$ 3,050,819.73				\$ 1,875,745.55
400	SURFACE COURSES AND PAVEMENT								
402	Prime Coat	liter	157,925.83	\$ 1.78	\$ 280,623.85	liter	157,925.83	\$ 1.03	\$ 162,450.94
403	Tack Coat	liter	48,139.74	\$ 1.97	\$ 94,715.42	liter	48,139.74	\$ 1.59	\$ 76,549.31
411(5)a	Asphaltic Concrete - Wearing Course (AC-WC) 5 cm	sq.m.	66,243.29	\$ 18.15	\$ 1,202,439.95	sq.m.	66,243.29	\$ 23.68	\$ 1,568,549.47
411(5)a1	Asphaltic Concrete - Wearing Course (AC-WC) 4 cm	sq.m.	94,004.89	\$ 14.56	\$ 1,368,936.66	sq.m.	94,004.89	\$ 19.74	\$ 1,855,912.47
411(6)a	Asphaltic Concrete - Binder Course (AC-BC) 6 cm	sq.m.	66,709.94	\$ 16.94	\$ 1,130,035.34	sq.m.	66,709.94	\$ 27.53	\$ 1,836,829.81
	Sub Total Section 400				\$ 4,076,751.23				\$ 5,500,292.00
500	BRIDGE CONSTRUCTION								
505	Reinforcing steel	kg	490,243.87	\$ 1.80	\$ 884,794.85	kg	490,243.87	\$ 1.62	\$ 795,665.79
506	Structural Concrete								
506(1)f	Structural concrete class "A" (25MPa) (Drainage, Retaining wall)	cu.m.	1,752.22	\$ 243.51	\$ 426,680.40	cu.m.	1,752.22	\$ 218.19	\$ 382,305.91
506(2)	Structural Concrete, Class B (21 Mpa)	cu.m.	811.73	\$ 217.00	\$ 176,145.37	cu.m.	811.73	\$ 231.85	\$ 188,196.36
506(6)b	Lean Concrete	cu.m.	212.47	\$ 141.99	\$ 30,168.55	cu.m.	212.47	\$ 110.11	\$ 23,395.48
519	Street Inlet Type C	Unit	105.00	\$ 99.38	\$ 10,434.38	Unit	105.00	\$ 75.17	\$ 7,892.80
520	Steel Deck	Sq.M	1,215.80	\$ 30.05	\$ 36,528.77	Sq.M	1,215.80	\$ 30.05	\$ 36,528.77
	Sub Total Section 500				\$ 1,564,752.32				\$ 1,433,988.11
600	DRAINAGE AND SLOPE PROTECTION WORKS								
601	Pipe Culverts and Storm Drains								
601(1)a	Reinforced concrete pipe culvert, 610mm diameter	l.m.	115.60	\$ 366.12	\$ 42,323.58	l.m.	115.60	\$ 204.63	\$ 23,654.95
601(1)b	Reinforced concrete pipe culvert, 800mm diameter	l.m.	360.68	\$ 382.52	\$ 137,967.21	l.m.	360.68	\$ 252.71	\$ 91,447.35
601(1)d	Reinforced concrete pipe culvert, 1,070mm diameter	l.m.	246.39	\$ 458.21	\$ 112,897.19	l.m.	246.39	\$ 299.07	\$ 73,688.70
601(1)e	Reinforced concrete pipe culvert, 2 x 1070mm diameter	l.m.	22.50	\$ 781.68	\$ 17,587.81	l.m.	22.50	\$ 299.07	\$ 6,729.15
601(1)f	Reinforced concrete pipe culvert, 1200 mm diameter	l.m.	149.90	\$ 527.45	\$ 79,064.80	l.m.	149.90	\$ 362.44	\$ 54,330.15
603	Manholes, Inlets and Catch Basin								
603(3)a	Catch Basins 1 (1.57 cu.m.)	Each	734.00	\$ 761.85	\$ 559,194.23	Each	734.00	\$ 671.27	\$ 492,709.24
603(3)b	Catch Basins 2 (2.41 Cu.m.)	Each	34.00	\$ 1,043.70	\$ 35,485.95	Each	34.00	\$ 914.27	\$ 31,085.22
603(3)c	Catch Basins 3 (2.41 Cu.m.)	Each	206.00	\$ 1,095.63	\$ 225,698.75	Each	206.00	\$ 949.90	\$ 195,678.58
603(3)d	Catch Basins 4 (2.57 Cu.m.)	Each	27.00	\$ 1,249.56	\$ 33,758.09	Each	27.00	\$ 1,080.64	\$ 29,177.32
603(3)e	Catch Basins 5 (3.14 Cu.m.)	Each	1.00	\$ 1,365.30	\$ 1,365.30	Each	1.00	\$ 1,190.53	\$ 1,190.53
603(3)f	Catch Basins 6 (4.29 Cu.m.)	Each	1.00	\$ 1,997.39	\$ 1,997.39	Each	1.00	\$ 1,724.31	\$ 1,724.31
603(3)g	Catch Basins 7 (5.43 Cu.m.)	Each	3.00	\$ 2,411.50	\$ 7,234.49	Each	3.00	\$ 2,077.48	\$ 6,232.44
601(1)e	Catch Basins 8 SM (4,485 Cu.m.)	Each	12.00	\$ 305.68	\$ 3,668.11	Each	12.00	\$ 279.05	\$ 3,348.55
601(2)f	Catch Basins 7 SM (6,5 Cu.m.)	Each	3.00	\$ 438.84	\$ 1,316.52	Each	3.00	\$ 400.12	\$ 1,200.35
601(2)h	Catch Basins 9 SM (6,801 Cu.m.)	Each	2.00	\$ 458.72	\$ 917.44	Each	2.00	\$ 418.19	\$ 836.38
601(2)i	Catch Basins 10 SM (6,018 Cu.m.)	Each	9.00	\$ 407.06	\$ 3,663.56	Each	9.00	\$ 371.23	\$ 3,341.07
601(2)j	Catch Basins 13 SM (7,682 Cu.m.)	Each	4.00	\$ 521.73	\$ 2,086.92	Each	4.00	\$ 475.91	\$ 1,905.63
601(2)m	Catch Basins 14 SM (5,51 Cu.m.)	Each	9.00	\$ 375.25	\$ 3,377.24	Each	9.00	\$ 342.47	\$ 3,082.22
601(2)n	Catch Basins 15 SM (5,717 Cu.m.)	Each	2.00	\$ 395.56	\$ 791.12	Each	2.00	\$ 361.53	\$ 723.07
603(4)a	Concrete covers CB 1 (0.22 Cu.m.)	Each	647.00	\$ 128.12	\$ 82,899.41	Each	647.00	\$ 112.02	\$ 72,474.35
603(4)b	Concrete covers CB 2 (0.35 Cu.m.)	Each	15.00	\$ 194.27	\$ 2,913.98	Each	15.00	\$ 172.31	\$ 2,584.67
603(4)c	Concrete covers CB 3 (0.39 Cu.m.)	Each	197.00	\$ 215.33	\$ 42,419.12	Each	197.00	\$ 191.45	\$ 37,715.97



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

Project

No. Package
Package Name
Division

Rehabilitation Of Liquiça Urban Road.

Lot 1 - Liquica Urban Road (20 Km)
Link 1 - 47
Munisipiu Liquica

BILL OF QUANTITY

ITEM NO.	ITEM DESCRIPTION	OWNER PURPOSED				ADN VERIFIED			
		UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)	UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)
603(4)d	Concrete covers CB 4 (0.46 Cu.m)	Each	10,00	\$ 251.75	\$ 2,517.46	Each	10,00	\$ 224.55	\$ 2,245.52
603(4)e	Concrete covers CB 5 (0.59 Cu.m)	Each	1,00	\$ 312.43	\$ 312.43	Each	1,00	\$ 279.72	\$ 279.72
603(4)f	Concrete covers CB 6 (0.83 Cu.m)	Each	1,00	\$ 433.79	\$ 433.79	Each	1,00	\$ 390.07	\$ 390.07
603(4)g	Concrete covers CB 7 (1.07 Cu.m)	Each	3,00	\$ 420.59	\$ 1,261.76	Each	3,00	\$ 388.44	\$ 1,165.32
603(4)h	Concrete covers CB SM 6 (0.27 Cu.m)	Each	9,00	\$ 162.72	\$ 1,464.44	Each	9,00	\$ 143.60	\$ 1,292.36
603(4)i	Concrete covers CB SM 9 (0.29 Cu.m)	Each	2,00	\$ 173.93	\$ 347.85	Each	2,00	\$ 153.95	\$ 307.89
603(4)j	Concrete covers CB SM 10 (0.34 Cu.m)	Each	3,00	\$ 193.19	\$ 579.56	Each	3,00	\$ 171.74	\$ 515.21
603(4)k	Concrete covers CB SM 14 (0.36 Cu.m)	Each	9,00	\$ 203.52	\$ 1,831.64	Each	9,00	\$ 181.27	\$ 1,631.39
603(4)l	Concrete covers CB SM 15 (0.42 Cu.m)	Each	2,00	\$ 225.83	\$ 451.65	Each	2,00	\$ 201.85	\$ 403.69
606	Stem masonry	cu.m.	54,00	\$ 70.33	\$ 3,976.67	cu.m.	54,00	\$ 73.29	\$ 39,576.15
606(1)	Blinding Stone	cu.m.	125,88	\$ 40.47	\$ 5,094.09	cu.m.	125,88	\$ 31.05	\$ 3,905.33
606(a)	Wing Wall RCP 600	Lin.m	13,43	\$ 221.00	\$ 2,967.99	Lin.m	13,43	\$ 224.53	\$ 3,015.44
606(b)	Wing Wall RCP 800	Lin.m	34,65	\$ 232.61	\$ 8,059.84	Lin.m	34,65	\$ 236.15	\$ 8,182.51
606(c)	Wing Wall RCP 1000	Lin.m	42,98	\$ 246.73	\$ 10,604.45	Lin.m	42,98	\$ 242.88	\$ 10,439.13
606(e)	Wing Wall RCP 1200	Lin.m	37,90	\$ 293.61	\$ 11,127.98	Lin.m	37,90	\$ 295.63	\$ 11,204.25
606(f)	Head Wall RCP 600	Unit	18,00	\$ 169.72	\$ 3,054.96	Unit	18,00	\$ 174.14	\$ 3,134.57
606(g)	Head Wall RCP 800	Unit	58,00	\$ 193.75	\$ 11,237.50	Unit	58,00	\$ 198.70	\$ 11,524.48
606(h)	Head Wall RCP 1000	Unit	44,00	\$ 218.25	\$ 9,602.96	Unit	44,00	\$ 223.75	\$ 9,845.17
606(j)	Head Wall RCP 1200	Unit	28,00	\$ 283.02	\$ 7,924.55	Unit	28,00	\$ 379.07	\$ 10,613.88
612	Side ditch								
612(1)a	Side Ditch 60x60 Cast in situ (0.33 Cu.m) (Base on Elevation)	Lin.m	37,36	\$ 103.04	\$ 3,849.64	Lin.m	37,36	\$ 95.68	\$ 3,574.71
612(1)b	Side Ditch 60x60 Cast in situ (0.33 Cu.m) + Cover (0.11 Cu.m)	Lin.m	103,95	\$ 132.29	\$ 13,751.44	Lin.m	103,95	\$ 129.80	\$ 13,492.54
612(1)c	Side Ditch 60x60 Stone masonry (0.59 Cu.m)	Lin.m	5,397.94	\$ 45.62	\$ 246,235.69	Lin.m	5,397.94	\$ 43.24	\$ 233,411.33
612(1)d	Side Ditch 60x60 Stone Masonry (0.59 Cu.m) + Cover (0.11 Cu.m)	Lin.m	7,390,94	\$ 94.49	\$ 698,535.28	Lin.m	7,390,94	\$ 89.67	\$ 662,751.62
612(1)e	U-Ditch 60x60 Precast	Lin.m	1,576,85	\$ 114.79	\$ 181,086.91	Lin.m	1,576,85	\$ 114.88	\$ 181,154.45
612(1)f	U-Ditch 60x60 Precast + Cover	Lin.m	4,717,72	\$ 143.56	\$ 677,286.48	Lin.m	4,717,72	\$ 143.54	\$ 677,177.28
612(2)a	Side Ditch 80x80 Cast in Situ (0.42 Cu.m) (Base on Elevation)	Lin.m	79,36	\$ 120.93	\$ 9,597.06	Lin.m	79,36	\$ 110.75	\$ 8,789.21
612(2)b	Side Ditch 80x80 Cast in Situ (0.42 Cu.m) + Cover (0.14 Cu.m)	Lin.m	493,59	\$ 136.88	\$ 67,561.81	Lin.m	493,59	\$ 153.28	\$ 75,656.83
612(2)c	Side Ditch 80x80 Stone Masonry (0.74 Cu.m)	Lin.m	5,446,97	\$ 53.79	\$ 293,004.43	Lin.m	5,446,97	\$ 54.23	\$ 295,412.13
612(2)d	Side Ditch 80x80 Stone Masonry (0.74 Cu.m) + Cover (0.14 Cu.m)	Lin.m	1,422,98	\$ 110.82	\$ 157,696.10	Lin.m	1,422,98	\$ 114.93	\$ 163,545.95
612(2)e	U-Ditch 80x80 Precast	Lin.m	2,387,71	\$ 151.42	\$ 361,539.25	Lin.m	2,387,71	\$ 151.40	\$ 361,500.61
612(2)f	U-Ditch 80x80 Precast + Cover	Lin.m	2,062,02	\$ 209.83	\$ 414,123.73	Lin.m	2,062,02	\$ 153.28	\$ 316,063.73
612(3)a	Side Ditch 100x100 Cast In Situ (0.51 Cu.m)	Lin.m	619,10	\$ 161.92	\$ 100,246.82	Lin.m	619,10	\$ 149.12	\$ 92,320.75
612(3)b	Side Ditch 100x100 Cast In Situ (0.51 Cu.m) + Cover (0.16 Cu.m)	Lin.m	1,629,89	\$ 250.92	\$ 408,976.44	Lin.m	1,629,89	\$ 238.72	\$ 389,694.78
612(3)c	Side Ditch 100x100 Stone Masonry (1.05 Cu.m)	Lin.m	946,86	\$ 70.53	\$ 66,778.74	Lin.m	946,86	\$ 76.95	\$ 72,864.66
612(3)d	Side Ditch 100x100 Stone Masonry (1.05 Cu.m) + Cover (0.16 Cu.m)	Lin.m	279,88	\$ 144.72	\$ 40,504.83	Lin.m	279,88	\$ 159.62	\$ 44,675.23
612(4)a	Side Ditch 120x120 Cast In Situ (0.60 Cu.m)	Lin.m	1,317,54	\$ 182.64	\$ 240,638.02	Lin.m	1,317,54	\$ 168.94	\$ 222,578.84
612(4)b	Side Ditch 120x120 Cast In Situ (0.60 Cu.m) + Cover (0.18 Cu.m)	Lin.m	229,89	\$ 266.64	\$ 61,297.16	Lin.m	229,89	\$ 252.93	\$ 58,146.12
612(4)d	Side Ditch 120x120 Stone Masonry (1.22 Cu.m) + Cover (0.18 Cu.m)	Lin.m	414,80	\$ 167.03	\$ 69,284.11	Lin.m	414,80	\$ 185.84	\$ 77,087.07
613	PVC 4"								
613(1)	PVC 2" with Palm Fiber Layer	Lin.m	6,97	\$ 3,09	\$ 21.55	Lin.m	6,97	\$ 3,53	\$ 24.57
613(2)	PVC 8"	Lin.m	70,80	\$ 23.15	\$ 1,638.67	Lin.m	70,80	\$ 22.58	\$ 1,595.45
614	Street Inlet Precast (Grill Cover)	Unit	1,252,00	\$ 46.18	\$ 57,811.19	Unit	1,252,00	\$ 41.00	\$ 51,332.00
	Sub Total Section 600				\$ 5,794,751.33				\$ 5,357,003.32
700	MISCELLANEOUS STRUCTURES								
701	Curb and/or Gutter								
701(1)a	Concrete curb Type 1 & 2	Lm	23,431,66	\$ 15.00	\$ 351,507.06	Lm	23,431,66	\$ 13.45	\$ 315,108.23
701(1)b	Concrete curb Type 3	Lm	7,328,00	\$ 15.00	\$ 109,930.08	Lm	7,328,00	\$ 13.45	\$ 98,546.73
701(2)	Concrete gutter	Lm	5,624,00	\$ 14.02	\$ 78,848.48	Lm	5,624,00	\$ 17.38	\$ 97,769.33
701(3)	Combination curb and gutter	Lm.m	31,723,12	\$ 9.69	\$ 307,466.84	Lin.m	31,723,12	\$ 9.69	\$ 307,466.84
702	Sidewalk								
702(1)a	Sidewalk (Paving Block) Type 1	sq.m.	14,472,21	\$ 17.03	\$ 246,476.15	sq.m.	14,472,21	\$ 18.49	\$ 267,591.10
702(1)b	Sidewalk (Paving Block) Type 2	sq.m.	4,420,09	\$ 17.03	\$ 75,277.02	sq.m.	4,420,09	\$ 18.49	\$ 81,725.80
702(1)c	Sidewalk (Paving Block) Type 3	sq.m.	772,50	\$ 17.03	\$ 13,156.45	sq.m.	772,50	\$ 18.49	\$ 14,283.53
702(1)d	Sidewalk (Paving Block) Type 4	sq.m.	5,232,30	\$ 17.03	\$ 89,111.30	sq.m.	5,232,30	\$ 18.49	\$ 96,745.23
702(1)e	Sidewalk (Paving Block) Type 5	sq.m.	4,323,75	\$ 17.03	\$ 73,637.79	sq.m.	4,323,75	\$ 18.49	\$ 79,946.14
702(1)f	Sidewalk (Paving Block) Type 6	sq.m.	6,914,10	\$ 17.03	\$ 117,754.08	sq.m.	6,914,10	\$ 18.49	\$ 127,841.76
702(1)g	Sidewalk (Paving Block) Type 7	sq.m.	4,176,86	\$ 17.03	\$ 71,136.17	sq.m.	4,176,86	\$ 18.49	\$ 77,230.22
702(1)h	Sidewalk (Paving Block) Type 8	sq.m.	293,55	\$ 17.03	\$ 4,999.45	sq.m.	293,55	\$ 18.49	\$ 5,427.74
702(1)i	Sidewalk (Paving Block) Type 9	sq.m.	312,55	\$ 17.03	\$ 5,323.04	sq.m.	312,55	\$ 18.49	\$ 5,779.05
702(1)j	Sidewalk (Paving Block) Type 10	sq.m.	2,057,60	\$ 17.03	\$ 35,043.03	sq.m.	2,057,60	\$ 18.49	\$ 38,045.07
702(1)k	Sidewalk (Paving Block) Type 11	sq.m.	233,25	\$ 17.03	\$ 3,972.48	sq.m.	233,25	\$ 18.49	\$ 4,312.79
702(2)a	Road Access Type 1A	Unit	66,00	\$ 273.00	\$ 18,018.00	Unit	66,00	\$ 122.00	\$ 8,052.00
702(2)b	Road Access Type 1B	Unit	31,00	\$ 173.00	\$ 5,363.00	Unit	31,00	\$ 78.00	\$ 2,418.00
702(2)c	Road Access Type 2A	Unit	150,00	\$ 249.00	\$ 37,350.00	Unit	150,00	\$ 121.00	\$ 18,150.00
702(2)d	Road Access Type 2B	Unit	73,00	\$ 159.00	\$ 11,607.00	Unit	73,00	\$ 78.00	\$ 5,694.00
702(2)e	Road Access Type 3A	Unit	119,00	\$ 554.00	\$ 65,926.00	Unit	119,00	\$ 349.00	\$ 41,531.00
702(2)f	Road Access Type 3B	Unit	247,00	\$ 349.00	\$ 86,203.00	Unit	247,00	\$ 221.00	\$ 54,587.00
702(2)g	Road Access Type 4A	Unit	34,00	\$ 554.00	\$ 18,836.00	Unit	34,00	\$ 349.00	\$ 11,866.00
702(2)h	Road Access Type 4B	Unit	5,00	\$ 349.00	\$ 1,745.00	Unit	5,00	\$ 221.00	\$ 1,105.00
702(2)i	Road Access Type 5A	Unit	10,00	\$ 249.00	\$ 2,499.00	Unit	10,00	\$ 121.00	\$ 1,210.00
702(2)j	Road Access Type 5B	Unit	11,00	\$ 159.00	\$ 1,749.00	Unit	11,00	\$ 78.00	\$ 858.00
702(2)k	Road Access Type 6A	Unit	16,00	\$ 554.00	\$ 8,864.00	Unit	16,00	\$ 349.00	\$ 5,584.00
702(2)l	Road Access Type 6B	Unit	29,00	\$ 349.00	\$ 10,121.00	Unit	29,00	\$ 221.00	\$ 6,409.00
706	Road Sign								



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

Project Rehabilitation Of Liquiça Urban Road.
 No. Package Lot 1 - Liquica Urban Road (20 Km)
 Package Name Link 1 - 47
 Division Municipio Liquica

BILL OF QUANTITY

ITEM NO.	ITEM DESCRIPTION	OWNER PURPOSED				ADN VERIFIED			
		UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)	UNIT	TOTAL QUANTITY LINK 1 - LINK 47	UNIT RATE (\$)	AMOUNT (\$)
706(1)	Warning signs	each	238.00	\$ 147.89	\$ 35,198.52	each	258.00	\$ 147.89	\$ 35,198.52
706(2)	Regulatory signs	each	130.00	\$ 146.89	\$ 19,096.08	each	130.00	\$ 146.89	\$ 19,096.08
706(3)	Informatory signs	each	9.00	\$ 2,423.59	\$ 21,812.31	each	9.00	\$ 2,423.59	\$ 21,812.31
706(4)	Directional Warning Sign	each	36.00	\$ 148.89	\$ 5,360.15	each	36.00	\$ 148.89	\$ 5,360.15
706(5)	Speed Limit Sign	each	114.00	\$ 148.49	\$ 16,928.19	each	114.00	\$ 148.49	\$ 16,928.19
706(6)	Service Sign	each	163.00	\$ 148.49	\$ 24,204.35	each	163.00	\$ 148.49	\$ 24,204.35
706(7)	Facility Sign	each	3.00	\$ 148.49	\$ 445.48	each	3.00	\$ 148.49	\$ 445.48
706(8)	Additional Sign	each	37.00	\$ 140.89	\$ 5,213.04	each	37.00	\$ 140.89	\$ 5,213.04
707	Pavement Markings								
707(1)	Pavement markings (reflective)	sq.m.	10,566.15	\$ 25.85	\$ 273,137.91	sq.m.	10,566.15	\$ 30.04	\$ 317,435.39
714	Reinstatement of Existing Bridge Structures.								
714(4)	Reinstatement of median existing	sq.m.	2,181.79	\$ 12.97	\$ 28,292.25	sq.m.	2,181.79	\$ 11.60	\$ 25,308.78
	Sub Total Section 700				\$ 2,281,599.67				\$ 2,246,285.82
800	BIOENGINEERING								
801	Nursery Establishment, Operation and Management								
801(2)	Grass slips production	Unit	2,168.00	\$ 2.34	\$ 5,073.12	Unit	2,168.00	\$ 1.63	\$ 3,533.84
805	Site Planting								
805(6)	Landscape	sq.m.	14,808.01	\$ 8.87	\$ 131,347.06	sq.m.	14,808.01	\$ 6.05	\$ 89,588.47
805(7)	Planting of Tree	each	1,174.00	\$ 11.12	\$ 13,054.88	each	1,174.00	\$ 8.30	\$ 9,744.20
805	Geotextile	sq.m.	2,750.26	\$ 3.10	\$ 8,522.96	sq.m.	2,750.26	\$ 2.11	\$ 5,798.56
808	Site Protection, Aftercare and Maintenance								
808(2)	Maintenance and Aftercare	lump sum	1.00	\$ 5,277.29	\$ 5,277.29	lump sum	1.00	\$ 5,386.50	\$ 5,386.50
	Sub Total Section 800				\$ 163,275.30				\$ 114,051.57
TOTAL					\$ 19,163,247.93				\$ 17,450,024.34



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

SUMMARY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

SECTION NO.	DESCRIPTION	VERIFIED BY OWNER AMOUNT (USD)	VERIFIED BY ADN, I.P. AMOUNT (USD)
100	GENERAL	\$ 904.610,49	\$ 589.155,91
200	EARTHWORKS	\$ 1.641.050,15	\$ 1.224.431,29
300	SUBBASE AND BASE COURSE	\$ 3.895.861,01	\$ 2.981.415,39
400	SURFACE COURSES	\$ 3.061.283,19	\$ 4.845.259,95
500	BRIDGE CONSTRUCTION	\$ 3.064.768,21	\$ 2.560.774,52
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES	\$ 9.872.598,59	\$ 8.788.941,54
700	MISCELLANEOUS STRUCTURES	\$ 624.683,75	\$ 648.285,24
800	BIO ENGINEERING	\$ 57.856,01	\$ 56.536,79
A	CONSTRUCTION COST	\$ 23.122.711	\$ 21.694.800,63
B	PROFIT 10% x A	\$ 2.312.271	\$ 2.169.480,06
C	OVERHEAD		\$ 159.600,00
D	PROVISIONAL SUM 5% x A	\$ 1.156.136	
E	CONTIGENCIES 5% x A	\$ 1.156.136	\$ 1.084.740,03
F	TAX 2% x (A+B+C+D+E)	\$ 2.312.271	\$ 502.172,41
G	TOTAL AMOUNT A+B+C+D+E	\$ 30.059.525	\$ 25.610.793,14

Verified by :

(Eng. Mário Gusmão Mendes)
Engineer Civil, UAP - ADN, I.P.

Checked By :

(Eng. Rogerio Marcal Pires)
Chefe Departamento, ITIAS, UAP - ADN, I.P.

Certified By :

(Arch. José Fernando Liu Soares)
Coordenador UAP - ADN, I.P.
27/5/25



AGÉNCIA DE DESARROLLO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marocho Bridge (26 KM)
 LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	PROPOSED BY OWNER				VERIFIED BY ADN, I.P.		
		UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$	UNIT	QUANTITY	UNIT RATE US \$
100 GENERAL								
102.1.1 Mobilization Requirement for All Contract	Ls	1,00	\$ 20,222.16	\$ 20,222.16	Ls	1,00	\$ 80,373.36	\$ 80,373.36
102.1.4 Demobilization of all contract	Ls	1,00	\$ 6,056.65	\$ 6,056.65	Ls	1,00	\$ 60,950.00	\$ 60,950.00
103 Field Offices and Facilities for the Contractor	Ls	1,00	\$ 191,450.69	\$ 191,450.69				
104 Office and Accommodations for the Engineer	Ls	1,00	\$ 54,420.00	\$ 54,420.00	Ls	1,00	\$ 54,262.55	\$ 54,262.55
105 Vehicles for the Engineer	Ls	1,00	\$ 164,600.00	\$ 164,600.00	Ls	1,00	\$ 117,820.00	\$ 117,820.00
106.1 Laboratory Testing Services	Ls	1,00	\$ 155,900.00	\$ 155,900.00	Ls	1,00	\$ 83,600.00	\$ 83,600.00
106.2 Drilling, Including SPT and Report	Ls	1,00	\$ 99,150.00	\$ 99,150.00	Ls	1,00	\$ 99,150.00	\$ 99,150.00
108 Traffic Management and Safety	Ls	1,00	\$ 6,181.00	\$ 6,181.00				
109 Field Engineering	Ls	1,00	\$ 89,420.00	\$ 89,420.00				
114 Environmental Safeguard	Ls	1,00	\$ 114,200.00	\$ 114,200.00	Ls	1,00	\$ 90,000.00	\$ 90,000.00
115(3) Relocation of Existing Electric Utility Pole - Medium Voltage	Each	10,00	\$ 30,000	\$ 300,000	Each	10,00	\$ 300,00	\$ 3,000,00
Sub Total Section 100				\$ 904,610.49				\$ 589,155.91
200 EARTHWORKS								
201(1) Clearing and grubbing	hectare	29.81	\$ 2,480.67	\$ 73,951.94	hectare	29.81	\$ 1,635.76	\$ 48,764.03
202(1) Removal of Structures and Obstructions	Lin.m	3413.59	\$ 18.54	\$ 63,274.21	Lin.m	3413.59	\$ 9.97	\$ 34,027.46
202(2) Removal of Structure and Obstruction (specific)	Cu.m.	535.50	\$ 26.86	\$ 14,383.53	Cu.m.	535.50	\$ 12.97	\$ 6,943.59
203(1)a Common excavation	Cu.m.	79918.90	\$ 5.70	\$ 455,537.72	Cu.m.	79918.90	\$ 1.93	\$ 153,930.10
204(1) Structure excavation	Cu.m.	6115.80	\$ 6.55	\$ 40,073.96	Cu.m.	6115.80	\$ 3.80	\$ 23,237.35
204(3)a Sand Layer	Cu.m.	282.39	\$ 20.54	\$ 5,799.22	Cu.m.	282.39	\$ 19.42	\$ 5,482.89
205(2) Selected Embankment	Cu.m.	30716.09	\$ 11.11	\$ 341,390.99	Cu.m.	30716.09	\$ 19.42	\$ 596,378.35
205(1) Common Embankment (Borrow Excavation (DT 10 Ton))	Cu.m.	79918.90	\$ 6.45	\$ 515,078.75	Cu.m.	79918.90	\$ 3.41	\$ 272,410.72
206(1) Subgrade preparation (Common Material)	sq.m.	134516.17	\$ 0.98	\$ 131,559.84	sq.m.	134516.17	\$ 0.62	\$ 83,256.81
Sub Total Section 200				\$ 1,641,050.15				\$ 1,224,431.29
300 SUBBASE AND BASE COURSE								



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)
LOCATION OF PROJECT : Maliana - Cailaco Robonoro, Mchinji



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)
 LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	PROPOSED BY OWNER			VERIFIED BY ADN, I.P.								
		UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$				
600	DRAINAGE AND SLOPE PROTECTION WORKS												
601(1)a	Reinforced concrete pipe culvert, 610mm diameter	l.m.	24.55	\$	253.32	\$	6.219.01	l.m.	24.55	\$	257.25	\$	6.315.49
601(1)a-1	Reinforced concrete pipe culvert, 2 x 610mm diameter	l.m.	9,10	\$	437.98	\$	3.985.63	l.m.	9,10	\$	257.25	\$	2.340.97
601(1)b	Reinforced concrete pipe culvert, 800mm diameter	l.m.	322.82	\$	234.82	\$	75.804.84	l.m.	322.82	\$	314.19	\$	101.425.06
601(1)d	Reinforced concrete pipe culvert, 1070mm diameter	l.m.	116.85	\$	301.11	\$	351.84.90	l.m.	116.85	\$	375.92	\$	43.926.60
601(2)	Reinforced concrete pipe culvert, 2 x 1070mm diameter	l.m.	8,90	\$	53.23	\$	4.763.58	l.m.	8,90	\$	375.92	\$	3.345.71
601(1)e	Reinforced concrete pipe culvert, 1200 mm diameter	l.m.	37.95	\$	35.00	\$	13.472.27	l.m.	37.95	\$	460.09	\$	17.460.42
601(2)a	Catch Basins 1 SM (1 Unit = 1.77 Cu.m)	Cu.m.	40.65	\$	80.60	\$	3.276.51	Cu.m.	40.65	\$	64.30	\$	2.613.93
601(2)c-1	Catch Basins 4 SM (1 Unit = 2.25 Cu.m)	Cu.m.	11.23	\$	84.37	\$	947.21	Cu.m.	11.23	\$	64.30	\$	721.85
601(2)l	Catch Basins 13 SM (1 Unit = 9.47 Cu.m)	Cu.m.	9.47	\$	91.03	\$	861.90	Cu.m.	9.47	\$	64.30	\$	608.82
603(5)jn	Catch Basins 14 SM (1 Unit = 6.83 Cu.m)	Cu.m.	20.50	\$	88.78	\$	1.819.75	Cu.m.	20.50	\$	64.30	\$	1.317.96
606	Stone masonry	Cu.m.	15443.67	\$	75.60	\$	1.167.607.37	Cu.m.	15443.67	\$	64.30	\$	993.010.39
606(l)	Blinding Stone	Cu.m.	252.58	\$	48.33	\$	12.208.26	Cu.m.	252.58	\$	40.18	\$	10.148.63
606(a)-1	Wing Wall RCP 2x600 - Type A (1 m = 3.15 Cu.m)	Cu.m.	12.58	\$	71.80	\$	903.24	Cu.m.	12.58	\$	64.30	\$	808.90
606(b)-1	Wing Wall RCP 800 = Type A (1 m = 3.32 Cu.m)	Cu.m.	412.98	\$	80.31	\$	33.167.02	Cu.m.	412.98	\$	64.30	\$	26.554.31
606(c)-1	Wing Wall RCP 1000 - Type A (1m = 3.38 Cu.m)	Cu.m.	42.17	\$	76.57	\$	3.228.82	Cu.m.	42.17	\$	64.30	\$	2.711.44
606(c)	Wing Wall RCP 1000 - Type B (1m = 3.84 Cu.m)	Cu.m.	152.57	\$	80.38	\$	12.263.86	Cu.m.	152.57	\$	64.30	\$	9.810.28
606(d)	Wing Wall RCP 2 x 1000 - Type B - (1m = 3.58 Cu.m)	Cu.m.	49.89	\$	77.93	\$	3.887.59	Cu.m.	49.89	\$	64.30	\$	3.207.71
606(e)	Wing Wall RCP 1200 - Type B (1m = 4.29 Cu.m)	Cu.m.	21.44	\$	77.73	\$	1.666.17	Cu.m.	21.44	\$	64.30	\$	1.378.33
606(f)	Head Wall RCP 600 (1 Unit = 5.51 Cu.m)	Cu.m.	44.11	\$	81.99	\$	3.616.79	Cu.m.	44.11	\$	64.30	\$	2.836.44
606(f)-1	Head Wall RCP 2 x 600 (1 Unit = 7.83 Cu.m)	Cu.m.	15.66	\$	80.59	\$	1.262.10	Cu.m.	15.66	\$	64.30	\$	1.006.94
606(g)	Head Wall RCP 800 (1 Unit = 5.95 Cu.m)	Cu.m.	410.53	\$	81.48	\$	33.451.75	Cu.m.	410.53	\$	64.30	\$	26.396.49
606(h)	Head Wall RCP 1000 (1 Unit = 6.33 Cu.m)	Cu.m.	145.64	\$	81.03	\$	11.801.34	Cu.m.	145.64	\$	64.30	\$	9.364.20
606(i)	Head Wall RCP 2 x 1000 (1 Unit = 11.87 Cu.m)	Cu.m.	23.74	\$	81.25	\$	1.929.19	Cu.m.	23.74	\$	64.30	\$	1.526.66



AGÈNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Malaria-Galico-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Malaria - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	PROPOSED BY OWNER						VERIFIED BY ADN, I.P.	
		UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
606(j)	Head Wall RCP 1200 (1 Unit = 7.26 Cu.m)	Cu.m.	36,32	\$ 81,95	\$ 2,976,56	Cu.m.	36,32	\$ 64,30	\$ 2,335,52
610	Gabions	Cu.m.	2295,54	\$ 64,25	\$ 147,494,88	Cu.m.	2295,54	\$ 51,31	\$ 117,789,44
612(1)c	Side Ditch 60x60 Stone Masonry	Cu.m.	4,224,71	\$ 68,45	\$ 289,198,93	Cu.m.	4,224,71	\$ 64,30	\$ 271,644,20
612(2)c	Side Ditch 80x80 Stone Masonry	Cu.m.	28903,28	\$ 71,02	\$ 2,052,611,25	Cu.m.	28903,28	\$ 64,30	\$ 1,858,447,38
612(2)d	Concrete Cover for Side Ditch 80x80 Stone Masonry (Excluding Reinforcement)	Cu.m.	24,41	\$ 190,47	\$ 4,649,81	Cu.m.	24,41	\$ 185,64	\$ 4,531,89
612(3)c	Side Ditch 100x100 Stone Masonry	Cu.m.	3745,36	\$ 74,39	\$ 278,607,36	Cu.m.	3745,36	\$ 64,30	\$ 240,822,47
612(3)d	Concrete Cover for Side Ditch 100x100 Stone Masonry (Excluding Reinforcement)	Cu.m.	1,12	\$ 190,47	\$ 213,94	Cu.m.	1,12	\$ 185,64	\$ 208,51
612(4)c	Side Ditch 120x120 Stone Masonry	Cu.m.	1691,61	\$ 72,24	\$ 122,206,37	Cu.m.	1691,61	\$ 64,30	\$ 106,766,27
612(4)g	Side Ditch 200x150 Stone Masonry	Cu.m.	531,42	\$ 71,65	\$ 38,077,38	Cu.m.	531,42	\$ 64,30	\$ 34,169,41
613	PVC 4" (for Sidewalk)	Lin.m	1110,62	\$ 7,05	\$ 7,828,76	Lin.m	1110,62	\$ 5,29	\$ 5,869,63
613(1)	PVC 2" with Palm Fiber Layer	Lin.m	9454,54	\$ 6,90	\$ 65,226,69	Lin.m	9454,54	\$ 4,06	\$ 38,527,26
505	Reinforcing steel	kg	1418497,70	\$ 2,16	\$ 3,063,955,03	kg	1418497,70	\$ 1,80	\$ 2,553,295,86
506(1)b	Structural concrete class "A" (30MPa) (Retaining Wall)	Cu.m.	6565,40	\$ 245,46	\$ 1,611,571,81	Cu.m.	6565,40	\$ 229,35	\$ 1,505,777,51
506(1)f	Structural concrete class "A" (25MPa) (Box Culvert)	Cu.m.	2116,62	\$ 189,43	\$ 400,949,09	Cu.m.	2116,62	\$ 199,64	\$ 422,560,10
506(2)	Structural Concrete, Class B (21 Mpa) Footing	Cu.m.	1684,08	\$ 171,00	\$ 287,978,15	Cu.m.	1684,08	\$ 175,04	\$ 294,782,70
506(6)b	Lean Concrete	Cu.m.	394,57	\$ 1,31,04	\$ 51,704,21	Cu.m.	394,57	\$ 110,62	\$ 43,646,32
506(6)c	Mortar	Cu.m.	1,47	\$ 65,45	\$ 96,00	Cu.m.	1,47	\$ 75,23	\$ 110,35
508 (1)	Rubber Pad 200x200 T=2cm (Approach Slab)	Unit	308,00	\$ 36,15	\$ 11,134,20	Unit	308,00	\$ 47,69	\$ 14,688,52
509	Anchor Bar (Approach Slab)	Kg	677,60	\$ 3,30	\$ 2,234,05	Kg	677,60	\$ 2,50	\$ 1,694,00
Sub Total Section 600					\$ 9,872,598,59				\$ 8,788,941,54
700 MISCELLANEOUS STRUCTURES									
701(1)	Concrete curb	L.m.	1443,04	\$ 17,69	\$ 25,520,96	l.m.	1443,04	\$ 19,49	\$ 28,118,54
702(1)	Sidewalk (Paving Block)	sq.m.	1360,53	\$ 14,61	\$ 19,880,20	sq.m.	1360,53	\$ 20,29	\$ 27,605,19



AGÉNCIA DE DESARROLLO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)
 LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	PROPOSED BY OWNER				VERIFIED BY ADN.I.P.			AMOUNT US \$
		UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$	UNIT	QUANTITY	UNIT RATE US \$	
702(2)	Road Access Type 1 (1 Unit Concrete = 1.38 Cu.m) Excluding Reinforcement	Cu.m	510,13	\$ 190,47	\$ 97,163,51	Cu.m	510,13	\$ 185,64	\$ 94,699,61
702(3)	Road Access Type 2 (1 Unit Concrete = 1.38 Cu.m) Excluding Reinforcement, Stone Masonry, Aggregate A & Common Embankment	Cu.m	6,63	\$ 190,47	\$ 1,261,86	Cu.m	6,63	\$ 185,64	\$ 1,229,87
505	Reinforcing steel (for Road Access)	kg	31646,10	\$ 2,16	\$ 68,355,58	kg	31646,10	\$ 1,80	\$ 56,962,98
703(3)	Kilometer posts	each	24,00	\$ 122,65	\$ 2,943,58	each	24,00	\$ 110,03	\$ 2,640,76
703(4)	Guide Posts	each	895,50	\$ 25,10	\$ 22,477,00	each	895,50	\$ 22,21	\$ 19,891,03
704(3)	Metal Guardrail (Metal Beam)	l.m.	1745,00	\$ 68,76	\$ 119,990,78	l.m.	1745,00	\$ 67,27	\$ 117,379,83
706(1)	Warning signs	each	146,00	\$ 158,55	\$ 23,148,12	each	146,00	\$ 156,97	\$ 22,917,46
706(2)	Regulatory signs	each	20,00	\$ 157,55	\$ 3,150,98	each	20,00	\$ 155,17	\$ 3,103,44
706(4)	Directional Warning Sign	each	70,00	\$ 159,55	\$ 11,168,41	each	70,00	\$ 158,77	\$ 11,113,60
706(5)	Speed Limit Sign	each	44,00	\$ 159,15	\$ 7,002,55	each	44,00	\$ 158,05	\$ 6,954,07
706(6)	Service Sign	each	36,00	\$ 159,15	\$ 5,729,36	each	36,00	\$ 158,05	\$ 5,689,69
706(7)	Facility Sign	each	6,00	\$ 159,15	\$ 954,89	each	6,00	\$ 158,05	\$ 948,28
707(1)	Pavement markings (reflective)	sq.m.	8289,24	\$ 26,05	\$ 215,935,99	sq.m.	8289,24	\$ 30,04	\$ 249,030,90
	Sub Total Section 700				\$ 624,683,75				\$ 648,285,24
800	BIOENGINEERING								
801(2)	Grass slips production	Unit	16464,50	\$ 2,34	\$ 38,526,93	Unit	16464,50	\$ 2,35	\$ 38,691,58
808(2)	Maintenance and Altercare	Ls	1,00	\$ 10554,57	\$ 10,554,57	Ls	1,00	\$ 10,710,00	\$ 10,710,00
805	Geotextile WG 15(100 KN/m) PET	sq.m.	2831,43	\$ 3,10	\$ 8,774,50	sq.m.	2831,43	\$ 2,52	\$ 7,135,21
	Sub Total Section 800				\$ 57,856,01				\$ 56,536,79
	TOTAL				\$ 23,122,711,40				\$ 21,694,800,63



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

OVERHEAD

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	VERIFIED BY ADN, I.P.			
		UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
I	PROJECT TEAM				
1	Project Manager	Ls	1,00	\$ 36.000,00	\$ 36.000,00
2	Site Manager	Ls	1,00	\$ 24.000,00	\$ 24.000,00
3	Site Engineer	Ls	1,00	\$ 24.000,00	\$ 24.000,00
4	Surveyor	Ls	1,00	\$ 22.000,00	\$ 22.000,00
5	Logistics	Ls	1,00	\$ 6.000,00	\$ 6.000,00
6	Administration	Ls	1,00	\$ 4.800,00	\$ 4.800,00
7	Cleaning Staff	Ls	1,00	\$ 3.600,00	\$ 3.600,00
8	Security	Ls	1,00	\$ 7.200,00	\$ 7.200,00
II	OPERATIONAL COST				
1	Stationary	Ls	1,00	\$ 4.800,00	\$ 4.800,00
2	Communication	Ls	1,00	\$ 1.200,00	\$ 1.200,00
3	Electricity	Ls	1,00	\$ 2.400,00	\$ 2.400,00
4	Water	Ls	1,00	\$ 2.400,00	\$ 2.400,00
5	Daily, weekly, monthly reports	Ls	1,00	\$ 1.200,00	\$ 1.200,00
6	Shop drawings, as built drawings	Ls	1,00	\$ 3.000,00	\$ 3.000,00
7	Traffic Management and Safety	Ls	1,00	\$ 15.000,00	\$ 15.000,00
III	SOCIAL COST				
1	Launch and Completion ceremony	Ls	1,00	\$ 2.000,00	\$ 2.000,00
				TOTAL COST	\$ 159.600,00



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

SUMMARY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

SECTION NO.	DESCRIPTION	AMOUNT (USD)
100	GENERAL	\$ -
200	EARTHWORKS	\$ -
300	SUBBASE AND BASE COURSE	\$ -
400	SURFACE COURSES	\$ -
500	BRIDGE CONSTRUCTION	\$ -
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES	\$ -
700	MISCELLANEOUS STRUCTURES	\$ -
800	BIO ENGINEERING	\$ -
A	CONSTRUCTION COST	\$ -
B	PROFIT 10% x A	\$ -
C	OVERHEAD	\$ -
D	CONTIGENCIES 5% x A	\$ -
E	TAX 2% x (A+B+C+D)	\$ -
F	TOTAL AMOUNT A+B+C+D	\$ -



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
100	GENERAL				
102.1.1	Mobilization Requirement for All Contract	Ls	1,00	\$ -	\$ -
102.1.4	Demobilization of all contract	Ls	1,00	\$ -	\$ -
104	Office and Accomodations for the Engineer	Ls	1,00	\$ -	\$ -
105	Vehicles for the Engineer	Ls	1,00	\$ -	\$ -
106,1	Laboratory Testing Services	Ls	1,00	\$ -	\$ -
106,2	Drilling, Including SPT and Report	Ls	1,00	\$ -	\$ -
114	Enviromental Safeguard	Ls	1,00	\$ -	\$ -
115(3)	Relocation of Existing Electric Utility Pole - MediumVoltage	Each	10,00	\$ -	\$ -
	Sub Total Section 100				\$ -
200	EARTHWORKS				
201(1)	Clearing and grubbing	hectare	29,81	\$ --	\$ -
202(1)	Removal of Structures and Obstructions	Lin.m	3413,59	\$ -	\$ -
202(2)	Removal of Structure and Obstruction (specific)	Cu.m.	535,50	\$ -	\$ -
203(1)a	Common excavation	Cu.m.	79918,90	\$ -	\$ -
204(1)	Structure excavation	Cu.m.	6115,80	\$ -	\$ -
204(3)a	Sand Layer	Cu.m.	282,39	\$ -	\$ -
205(2)	Selected Embankment	Cu.m.	30716,09	\$ -	\$ -
205(1)	Common Embakment (Borrow Excavation (DT 10 Ton)	Cu.m.	79918,90	\$ -	\$ -
206(1)	Subgrade preparation (Common Material)	sq.m.	134516,17	\$ -	\$ -
	Sub Total Section 200				\$ -
300	SUBBASE AND BASE COURSE				
303(1)	Aggregate Base Class A	Cu.m.	32680,17	\$ -	\$ -
303(2)	Aggregate Base Class B	Cu.m.	53235,27	\$ -	\$ -
	Sub Total Section 300				\$ -
400	SURFACE COURSES AND PAVEMENT				
402	Prime Coat	liter	156230,33	\$ -	\$ -
403	Tack Coat	liter	2475,69	\$ -	\$ -
411(5a)	Asphaltic Concrete - Wearing Course (AC-WC) 5 cm	sq.m.	4951,37	\$ -	\$ -
411(6)a	Asphaltic Concrete - Binder Course (AC-BC) 6 cm	sq.m.	156230,33	\$ -	\$ -
412(2)	PCC Pavement (Reinforced)	Cu.m.	601,46	\$ -	\$ -
	Sub Total Section 400				\$ -
500	BRIDGE CONSTRUCTION				
501(a)	Bore Pile Dia 800.	l.m.	2304,00	\$ -	\$ -
505	Reinforcing steel	kg	643581,70	\$ -	\$ -
506(1)b	Structural concrete class "A" (30MPa) Pier, pier Head, Diaghfragma	Cu.m.	931,03	\$ -	\$ -
506(1)f	Structural concrete class "A" (25MPa)	Cu.m.	2199,74	\$ -	\$ -
506(2)	Structural Concrete, Class B (21 Mpa) Footing	Cu.m.	104,00	\$ -	\$ -
506(6)b	Lean Concrete	Cu.m.	136,32	\$ -	\$ -
507	Expansion Joint Seal Rubber Type 1 (Gap 21-41 mm)	Lin.M	110,59	\$ -	\$ -
508	Bearing pad 350x350x40	Unit	16,00	\$ -	\$ -
508(1)	Bearing pad 420x500x50	Unit	32,00	\$ -	\$ -



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
508 (1)	Rubber Pad 200x200 T=2cm	Unit	86,00	\$ -	\$ -
509	Anchor Bar	Kg	4483,11	\$ -	\$ -
510	Pipe drainage 6"	Lin.M	218,30	\$ -	\$ -
511	Deck Drain 6"	Unit	64,00	\$ -	\$ -
	Sub Total Section 500				\$ -
600	DRAINAGE AND SLOPE PROTECTION WORKS				
601(1)a	Reinforced concrete pipe culvert, 610mm diameter	l.m.	24,55	\$ -	\$ -
601(1)a-1	Reinforced concrete pipe culvert, 2 x 610mm diameter	l.m.	9,10	\$ -	\$ -
601(1)b	Reinforced concrete pipe culvert, 800mm diameter	l.m.	322,82	\$ -	\$ -
601(1)d	Reinforced concrete pipe culvert, 1070mm diameter	l.m.	116,85	\$ -	\$ -
601(2)	Reinforced concrete pipe culvert, 2 x 1070mm diameter	l.m.	8,90	\$ -	\$ -
601(1)e	Reinforced concrete pipe culvert, 1200 mm diameter	l.m.	37,95	\$ -	\$ -
601(2)a	Catch Basins 1 SM (1 Unit = 1.77 Cu.m)	Cu.m.	40,65	\$ -	\$ -
601(2)c-1	Catch Basins 4 SM (1 Unit = 2.25 Cu.m)	Cu.m.	11,23	\$ -	\$ -
601(2)i	Catch Basins 13 SM (1 Unit = 9.47 Cu.m)	Cu.m.	9,47	\$ -	\$ -
603(5)m	Catch Basins 14 SM (1 Unit = 6.83 Cu.m)	Cu.m.	20,50	\$ -	\$ -
606	Stone masonry	Cu.m.	15443,67	\$ -	\$ -
606(1)	Blinding Stone	Cu.m.	252,58	\$ -	\$ -
606(a)-1	Wing Wall RCP 2x600 - Type A (1 m = 3.15 Cu.m)	Cu.m.	12,58	\$ -	\$ -
606(b)-1	Wing Wall RCP 800 = Type A (1m = 3.32 Cu.m)	Cu.m.	412,98	\$ -	\$ -
606(b)	Wing Wall RCP 800 - Type B (1m = 3.46 Cu.m)	Cu.m.	42,17	\$ -	\$ -
606(c)-1	Wing Wall RCP 1000 - Type A (1m = 3.38 Cu.m)	Cu.m.	152,57	\$ -	\$ -
606(c)	Wing Wall RCP 1000 - Type B (1m = 3.84 Cu.m)	Cu.m.	49,89	\$ -	\$ -
606(d)	Wing Wall RCP 2 x 1000 - Type B - (1m = 3.38 Cu.m)	Cu.m.	6,76	\$ -	\$ -
606(e)	Wing Wall RCP 1200 - Type B (1m = 4.29 Cu.m)	Cu.m.	21,44	\$ -	\$ -
606(f)	Head Wall RCP 600 (1 Unit = 5.51 Cu.m)	Cu.m.	44,11	\$ -	\$ -
606(f)-1	Head Wall RCP 2 x 600 (1 Unit = 7.83 Cu.m)	Cu.m.	15,66	\$ -	\$ -
606(g)	Head Wall RCP 800 (1 Unit = 5.95 Cu.m)	Cu.m.	410,53	\$ -	\$ -
606(h)	Head Wall RCP 1000 (1 Unit = 6.33 Cu.m)	Cu.m.	145,64	\$ -	\$ -
606(i)	Head Wall RCP 2 x 1000 (1 Unit = 11.87 Cu.m)	Cu.m.	23,74	\$ -	\$ -
606(j)	Head Wall RCP 1200 (1 Unit = 7.26 Cu.m)	Cu.m.	36,32	\$ -	\$ -
610	Gabions	Cu.m.	2295,54	\$ -	\$ -
612(1)c	Side Ditch 60x60 Stone Masonry	Cu.m.	4224,71	\$ -	\$ -
612(2)c	Side Ditch 80x80 Stone Masonry	Cu.m.	28903,28	\$ -	\$ -
612(2)d	Concrete Cover for Side Ditch 80x80 Stone Masonry (Excluding Reinforcement)	Cu.m.	24,41	\$ -	\$ -
612(3)c	Side Ditch 100x100 Stone Masonry	Cu.m.	3745,36	\$ -	\$ -
612(3)d	Concrete Cover for Side Ditch 100x100 Stone Masonry (Excluding Reinforcement)	Cu.m.	1,12	\$ -	\$ -
612(4)c	Side Ditch 120x120 Stone Masonry	Cu.m.	1691,61	\$ -	\$ -
612(4)g	Side Ditch 200x150 Stone Masonry	Cu.m.	531,42	\$ -	\$ -
613	PVC 4" (for Sidewalk)	Lin.m	1110,62	\$ -	\$ -
613(1)	PVC 2" with Palm Fiber Layer	Lin.m	9454,54	\$ -	\$ -



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

BILL OF QUANTITY

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
505	Reinforcing steel	kg	1418497,70	\$ -	\$ -
506(1)b	Structural concrete class "A" (30MPa) (Retaining Wall)	Cu.m.	6565,40	\$ -	\$ -
506(1)f	Structural concrete class "A" (25MPa) (Box Culvert)	Cu.m.	2116,62	\$ -	\$ -
506(2)	Structural Concrete, Class B (21 Mpa) Footing	Cu.m.	1684,08	\$ -	\$ -
506(6)b	Lean Concrete	Cu.m.	394,57	\$ -	\$ -
506(6)c	Mortar	Cu.m.	1,47	\$ -	\$ -
508 (1)	Rubber Pad 200x200 T=2cm (Approach Slab)	Unit	308,00	\$ -	\$ -
509	Anchor Bar (Approach Slab)	Kg	677,60	\$ -	\$ -
	Sub Total Section 600				\$ -
700	MISCELLANEOUS STRUCTURES				
701(1)	Concrete curb	l.m.	1443,04	\$ -	\$ -
702(1)	Sidewalk (Paving Block)	sq.m.	1360,53	\$ -	\$ -
702(2)	Road Access Type 1 (1 Unit Concrete = 1.38 Cu.m) Excluding Reinforcement	Cu.m	510,13	\$ -	\$ -
702(3)	Road Access Type 2 (1 Unit Concrete = 1.38 Cu.m) Excluding Reinforcement, Stone Masonry, Aggregate A & Common Embankment	Cu.m	6,63	\$ -	\$ -
505	Reinforcing steel (for Road Access)	kg	31646,10	\$ -	\$ -
703(3)	Kilometer posts	each	24,00	\$ -	\$ -
703(4)	Guide Posts	each	895,50	\$ -	\$ -
704(3)	Metal Guardrail (Metal Beam)	l.m.	1745,00	\$ -	\$ -
706(1)	Warning signs	each	146,00	\$ -	\$ -
706(2)	Regulatory signs	each	20,00	\$ -	\$ -
706(4)	Directional Warning Sign	each	70,00	\$ -	\$ -
706(5)	Speed Limit Sign	each	44,00	\$ -	\$ -
706(6)	Service Sign	each	36,00	\$ -	\$ -
706(7)	Facility Sign	each	6,00	\$ -	\$ -
707(1)	Pavement markings (reflective)	sq.m.	8289,24	\$ -	\$ -
	Sub Total Section 700				\$ -
800	BIOENGINEERING				
801(2)	Grass slips production	Unit	16464,50	\$ -	\$ -
808(2)	Maintenance and Aftercare	ls	1,00	\$ -	\$ -
805	Geotextile WG 15(100 KN/m) PET	sq.m.	2831,43	\$ -	\$ -
	Sub Total Section 800				\$ -
	TOTAL				\$ -



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

OVERHEAD

NAME OF PROJECT : National Road, Maliana-Cailaco-Marobo Bridge (26 KM)

LOCATION OF PROJECT : Maliana - Cailaco, Bobonaro Municipal

PAY ITEM	ITEM DESCRIPTION	UNIT	QUANTITY	UNIT RATE US \$	AMOUNT US \$
I	PROJECT TEAM				
1	Project Manager	Ls	1,00	\$ -	\$ -
2	Site Manager	Ls	1,00	\$ -	\$ -
3	Site Engineer	Ls	1,00	\$ -	\$ -
4	Surveyor	Ls	1,00	\$ -	\$ -
5	Logistics	Ls	1,00	\$ -	\$ -
6	Administration	Ls	1,00	\$ -	\$ -
7	Cleaning Staff	Ls	1,00	\$ -	\$ -
8	Security	Ls	1,00	\$ -	\$ -
II	OPERATIONAL COST				
1	Stationary	Ls	1,00	\$ -	\$ -
2	Communication	Ls	1,00	\$ -	\$ -
3	Electricity	Ls	1,00	\$ -	\$ -
4	Water	Ls	1,00	\$ -	\$ -
5	Daily, weekly, monthly reports	Ls	1,00	\$ -	\$ -
6	Shop drawings, as built drawings	Ls	1,00	\$ -	\$ -
7	Traffic Management and Safety	Ls	1,00	\$ -	\$ -
III	SOCIAL COST				
1	Launch and Completion ceremony	Ls	1,00	\$ -	\$ -
				TOTAL COST	\$ -

DATA INPUT

Naran Projecto									
Municipio	Bobonaro	Postu Adm	Cailaco			Project Duration	12	Bulan	
Suco	Manapa								

No	Nama Alat	Kondisi Operasi (Efisiensi)	Bucket Fill Factor	Kecepatan (Km/Jam)		Jarak Buang (Km)		Biaya Sewa Truck		Jarak (Km)		
				Kosong	Muat			Truck 5,5 ton	\$ 348,17			
A	Earth Works, Sub Base & Base Course					Back Fill	Disposal	Truck 10 ton	\$ 700,00	AMP / Batching Plant		
1	Dump Truck	Baik		30	15	0,2	5	158,22	Tronton	Material Lokal		
2	Excavator	Baik	Mudah	Quarry				Bucket Fill Factor				
3	Buldozer	Sedang		Raihenek Ateiru	Quarry of Beduku River			Kondisi Operasi	Kondisi Lapangan			
4	Wheel Loader	Sedang	Agak Sulit	Raihenek	Quarry of Beduku River			Mudah	Tanah biasa berpasir, kering			
5	Motor grader	Penyebaran, grading		Fatuk Mota	Quarry of Beduku River			Agak sulit	Tanah biasa berbatu			
6	Tandem roller	Sedang		Britas	Quarry of Stone Crusher Berfikra (ETK)			Sulit	Batu pecah hasil ledakan			
B	Surface Works											
1	Tebal Sub Base Course (m)		0,2									
2	Tebal Base Course (m)		0,15									
3	Tebal ACBC (m)		0,06									
4	Tebal ACWC (m)		0,05									

C Bridge, Drainage & Slope Protection Works		
1	Deskripsi	Rasio Bekisting tular dezenho
2	Beton 10 Mpa	0,0000
3	Beton 15 Mpa	1,2503
4	Beton 20 Mpa	1,2503
5	Beton 25 Mpa	1,2503
6	Beton 30 Mpa	1,2503
7	Concrete Cyclope	1,2503

Presu Material Lokal			
No	Nama Material	Satuan	Harga
1	Tanah urug	M3	\$ 5,00
2	Sirtu	M3	\$ 13,33
3	Pasir urug	M3	\$ 13,33
4	Pasir pasang	M3	\$ 16,33
5	Pasir beton	M3	\$ 19,83
6	Pasir Plesteran	M3	\$ 19,83
7	Batu kali	M3	\$ 20,00
8	Batu belah 15/20	M3	\$ 20,00
9	Batu belah 20/40	M3	
10	River Stone 10/20	M3	\$ -
11	Batu pecah	M3	\$ 40,00
12	Batu pecah 2/3	M3	\$ 40,00
13	Batu pecah 3/5	M3	\$ 40,00
14	Batu pecah 1/2	M3	\$ 40,00
15	Batu pecah 0-5	M3	\$ 50,00
16	Abu Batu	M3	\$ 50,00

Prepara husi:

Akompanha husi:

(.....)

(.....)

Civil Engineer ADN, I.P.



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

**APPROVAL SHEET
SUMMARY OF BILL OF QUANTITY**

NAME OF PROJECT :Road Improvement Section 2 :Ainaro Urban Road , L= 24.226
LOCATION OF PROJECT : District Ainaro

No.	Work Description	OWNER ESTIMATE Amount (USD)	VERIFIED BY ADN Amount (USD)
100	GENERAL REQUIREMENTS	\$ 1.196.077,52	\$ 742.518,84
200	EARTHWORKS	\$ 2.517.949,77	\$ 1.908.759,34
300	SUB BASE AND BASE COURSE	\$ 2.974.618,92	\$ 3.099.882,47
400	SURFACE COURSE	\$ 2.775.792,87	\$ 3.673.289,93
500	BRIDGE CONSTRUCTION	\$ 2.992.740,79	\$ 2.736.173,42
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES	\$ 4.871.048,43	\$ 4.835.845,65
700	MISCELLANEOUS STRUCTURES	\$ 1.918.749,78	\$ 1.968.529,04
800	BIOENGINEERING	\$ 33.856,40	\$ 33.856,40
900	MATERIALS DETAILS	\$ 56.801,66	\$ 40.027,93
A	CONSTRUCTION COST	\$ 19.337.636,14	
B	PROFIT AND OVERHEAD (10% x A)	\$ 1.933.763,61	
C	PROVISIONAL SUM (5% of A)	\$ 966.881,81	
D	CONTIGENCIES (5% of A)	\$ 966.881,81	
E	Tax 10% (A+B+C)	\$ 1.933.763,61	
F	GRAND TOTAL (A+B+C+D)	\$ 25.138.927,00	
A	CONSTRUCTION COST		\$ 19.038.883,02
B	CONTRACTOR FEE (10 x A)		\$ 1.903.888,30
C	CONTIGENCIES (5% of A)		\$ 951.944,15
D	OVERHEAD		\$ 63.046,67
E	TAX 2% (A+B+C+D)		\$ 439.155,24
F	GRAND TOTAL (A+B+C+D)		\$ 22.396.917,38

Verified By :

Eng. Paulino Abrantes Correia
Engenheiro. UAP - ADN.IP

Checked By

Eng. Rogerio M. Pires
Chefe Departamento ITIAS UAP - ADN.IP

Certified By:

Eng. José Fernando Lu Soares
Coordenador. UAP - ADN.IP

27/5/15



AGENCIA DE DESENVOLVIMENTO NACIONAL - P

COST ESTIMATE

NAME OF PROJECT : Road Improvement Section 2 : Ainaro Urban Road , L= 24.226
LOCATION OF PROJECT : District Ainaro

No.	Work Description	OWNER ESTIMATE				VERIFIED BY ADN		
		Unit	Quantity	Unit Price (USD)	Amount (USD)	Unit	Quantity	Unit Price (USD)
100	GENERAL REQUIREMENTS							
102.1.1	Mobilization Requirement for All Contract	L.s	1,00	\$ 26.441,00	\$ 26.441,00	L.s	1,00	\$ 88.122,80
102.1.4	Demobilization of All Contract	L.s	1,00	\$ 8.540,00	\$ 8.540,00	L.s	1,00	\$ 50.370,00
103	Field Office and Facilities for the Contractor	L.s	1,00	\$ 176.205,00	\$ 176.205,00			
104	Offices and Accommodation for the Engineer	L.s	1,00	\$ 75.820,00	\$ 75.820,00	L.s	1,00	\$ 31.289,08
105	Vehicles for the Engineer (2 units of 4 WD Cars 2 units of Motorbikes)	L.s	1,00	\$ 117.400,00	\$ 117.400,00	L.s	1,00	\$ 107.410,00
106.1	Laboratory Testing Service	L.s	1,00	\$ 90.900,00	\$ 90.900,00	L.s	1,00	\$ 61.800,00
106.2	Drilling, Including SPT and Report	L.s	1,00	\$ 57.583,03	\$ 57.583,03	L.s	1,00	\$ 36.702,67
108	Traffic Management System & Safety	L.s	1,00	\$ 11.170,68	\$ 11.170,68	L.s	1,00	\$ 6.181,00
109	Field Engineering	L.s	1,00	\$ 107.000,00	\$ 107.000,00			
114	Environment Safeguard	L.s	1,00	\$ 72.500,00	\$ 72.500,00	L.s	1,00	\$ 9.000,00
115 (1)	Relocation of Existing Phone Utility Pole	Each	44,00	\$ 476,74	\$ 20.976,37	Each	44,00	\$ 150,00
115 (2)	Relocation of Existing Electric Utility Pole - Low Voltage	Each	44,00	\$ 1.754,56	\$ 77.200,47	Each	44,00	\$ 477,57
115(4)	Relocation of Existing Water Supply Utility Pipes & water tanks	L.s	1,00	\$ 354.340,97	\$ 354.340,97	L.s	1,00	\$ 324.030,20
	Sub Total 100				\$ 1.196.077,52			\$ 742.518,84
200	EARTHWORKS							
201(1)	Clearing and Grubbing	Hectare	17,19	\$ 1.938,02	\$ 33.311,77	Hectare	17,19	\$ 817,88
202(3)	Removal of Pavement, Sidewalks, Curbs, etc.	Sq.m	7.088,00	\$ 8,91	\$ 63.147,26	Sq.m	7.088,00	\$ 2,53
202(4)	Removal of Existing Pipe, Culvert and Lined Drain	Ln.m	26.150,70	\$ 39,56	\$ 1.034.587,55	Ln.m	26.150,70	\$ 14,65
203(2)	Surplus Common Excavation	Cu.m	105.849,33	\$ 4,02	\$ 425.803,97	Cu.m	105.849,33	\$ 1,93
204(1)	Structure Excavation	Cu.m	6.125,70	\$ 6,40	\$ 39.203,02	Cu.m	6.125,70	\$ 3,27
204(2)	Bridge Excavation	Cu.m	1.018,48	\$ 6,40	\$ 6.518,04	Cu.m	1.018,48	\$ 3,27
205(1)	Common Embankment (From Surplus Excavation)	Cu.m	44.129,34	\$ 5,27	\$ 232.561,62	Cu.m	44.129,34	\$ 22,34
205(3)	Granular Selected Embankment	Cu.m	8.037,40	\$ 36,96	\$ 297.036,99	Cu.m	8.037,40	\$ 22,34
206(2)	Subgrade preparation (Existing pavement)	Sq.m	96.080,00	\$ 1,73	\$ 166.470,22	Sq.m	96.080,00	\$ 0,62
206(3)	Subgrade preparation (Unsuitable material)	Sq.m	67.574,70	\$ 3,25	\$ 219.309,33	Sq.m	67.574,70	\$ 0,62
	Sub Total 200				\$ 2.517.949,77			\$ 1.908.759,34
300	SUB BASE AND BASE COURSE							
302,1	Aggregate Base Class C	Cu.m	7.462,97	\$ 27,77	\$ 207.246,68	Cu.m	7.462,97	\$ 22,43
303(1)	Aggregate Base Class A	Cu.m	24.241,04	\$ 57,94	\$ 1.404.507,76	Cu.m	24.241,04	\$ 68,32
303(2)	Aggregate Base Class B	Cu.m	25.196,56	\$ 54,09	\$ 1.362.864,48	Cu.m	25.196,56	\$ 50,66
	Sub Total 300				\$ 2.974.618,92			\$ 3.099.882,47
400	SURFACE COURSE							
402	Prime Coat	Liter	144.545,19	\$ 0,81	\$ 116.617,00	Liter	144.545,19	\$ 1,48
411(5a)	Asphaltic Concrete - Wearing Course (AC-WC) 5 cm	Sq.m	144.677,69	\$ 18,38	\$ 2.659.175,87	Sq.m	144.677,69	\$ 23,91
	Sub Total 400				\$ 2.775.792,87			\$ 3.673.289,93
500	BRIDGE CONSTRUCTION							
501	Piling Ø 600mm	m	307,20	\$ 116,24	\$ 35.708,04	m	307,20	\$ 120,80
502	Railing	m	1.100,40	\$ 24,51	\$ 26.972,42	m	1.100,40	\$ 24,51
505	Reinforcing Steel	Kg	1.080.306,38	\$ 1,93	\$ 2.133.983,07	Kg	1.080.306,38	\$ 1,72
506(1)	Structural Concrete, Class A (f'c 25 M.Pa)	Cu.m	4.610,16	\$ 165,05	\$ 760.888,36	Cu.m	4.610,16	\$ 169,67
506(1).a	Structural Concrete, Class A (f'c 35 M.Pa)	Cu.m	4,37	\$ 182,86	\$ 799,83	Cu.m	4,37	\$ 182,86
506(2)	Structural Concrete, Class B (f'c >10 M.Pa)	Cu.m	170,06	\$ 139,32	\$ 23.692,55	Cu.m	170,06	\$ 120,69
512(4)	Elastomeric Bearing Type 3 (450x400x45) mm3	Each	60,00	\$ 178,28	\$ 10.696,52	Each	60,00	\$ 174,18
	Sub Total 500				\$ 2.992.740,79			\$ 2.736.173,42
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES							
602(1.a)	Underdrain 40x50 Cm (Description)	Ln.m	272,20	\$ 55,00	\$ 14.971,00	Ln.m	272,20	\$ 62,00
602(1.c)	Underdrain 60 x 80 Cm (Description)	Ln.m	5.873,24	\$ 61,00	\$ 358.267,64	Ln.m	5.873,24	\$ 57,00
602(1.d)	Underdrain 100 x 80 Cm (Description)	Ln.m	2.720,00	\$ 99,00	\$ 269.280,00	Ln.m	2.720,00	\$ 103,00
602(1.e)	Underdrain 120 x 100 Cm (Description)	Ln.m	8.027,00	\$ 142,00	\$ 1.139.834,00	Ln.m	8.027,00	\$ 142,00
603(1)	Manholes	Each	3.331,00	\$ 168,00	\$ 559.608,00	Each	3.331,00	\$ 162,00
603(2)	Inlets, type	Each	6.657,00	\$ 53,00	\$ 352.821,00	Each	6.657,00	\$ 61,00
604	Stone Masonry	Cu.m	25.144,92	\$ 81,43	\$ 2.047.551,12	Cu.m	25.144,92	\$ 80,60
610	Gabions	Cu.m	1.785,00	\$ 72,11	\$ 128.715,67	Cu.m	1.785,00	\$ 51,39
	Sub Total 600				\$ 4.871.048,43			\$ 4.835.845,65
700	MISCELLANEOUS STRUCTURES							
701(1)	Concrete Curb	Ln.m	19.819,00	\$ 13,02	\$ 258.048,32	Ln.m	19.819,00	\$ 12,42
701(2)	Concrete Gutter	Ln.m	19.550,00	\$ 4,45	\$ 87.057,24	Ln.m	19.550,00	\$ 6,21
702	Sidewalk with Difable	Sq.m	33.843,00	\$ 18,10	\$ 612.562,26	Sq.m	33.843,00	\$ 18,12
703(5)	Street Lighting	Each	368,00	\$ 2.245,69	\$ 826.415,63	Each	368,00	\$ 2.193,04
705(1)	Warning Signs	Each	701,00	\$ 47,17	\$ 33.066,70	Each	701,00	\$ 45,34
706(2)	Regulatory Signs	Each	78,00	\$ 47,17	\$ 3.679,32	Each	78,00	\$ 45,34
706(3)	Informatory Signs	Each	22,00	\$ 47,17	\$ 1.037,76	Each	22,00	\$ 45,34
707(1)	Pavement Markings (Reflective)	Sq.m	6.238,41	\$ 15,53	\$ 96.882,55	Sq.m	6.238,41	\$ 23,14
	Sub Total 700				\$ 1.918.749,78			\$ 1.968.529,04
800	BIOENGINEERING							
801(1)	Nursery establishment operation and management	L.s	1,00	\$ 6.500,00	\$ 6.500,00	L.s	1,00	\$ 6.500,00
801(2)	Grass slips production	Sq.m	2.340,00	\$ 5,25	\$ 12.285,00	Sq.m	2.340,00	\$ 5,25
803(1)	Slope trimming and preparation	Sq.m	2.340,00	\$ 3,50	\$ 8.190,00	Sq.m	2.340,00	\$ 3,50
805(4)	Planting of Tree/Shrub, Bamboo & Hard wood Cuttings	Each	656,00	\$ 3,90	\$ 2.558,40	Each	656,00	\$ 3,90
808(2)	Maintenance and Aftercare	L.s	1,00	\$ 4.323,00	\$ 4.323,00	L.s	1,00	\$ 4.323,00
	Sub Total 800				\$ 33.856,40			\$ 33.856,40
900	MATERIALS DETAILS							
904(12)	Bed Course Material	Cu.m	1.792,00	\$ 31,70	\$ 56.801,66	Cu.m	1.792,00	\$ 22,34
	Sub Total 900				\$ 56.801,66			\$ 40.027,93
	TOTAL				\$ 19.337.636,14			\$ 19.038.883,02

OVERHEAD

NAME OF PROJECT :Road Improvement Section 2 : Ainaro Urban Road , L= 24.226
 LOCATION OF PROJECT : District Ainaro

NO	DESKRISAUN	UNIT	QTY	UNIT RATE US \$	AMOUNT US \$
1	PROJECT TEAM				
	Project Manager	Ls	1,00	\$ 9.000,00	\$ 9.000,00
	Site Manager	Ls	1,00	\$ 9.600,00	\$ 9.600,00
	Site Engineer	Ls	1,00	\$ 12.000,00	\$ 12.000,00
	Surveyor	Ls	1,00	\$ 6.000,00	\$ 6.000,00
	Logistics	Ls	1,00	\$ 3.600,00	\$ 3.600,00
	Administration	Ls	1,00	\$ 3.600,00	\$ 3.600,00
	Cleaning Staff	Ls	1,00	\$ 1.500,00	\$ 1.500,00
	Security	Ls	1,00	\$ 1.800,00	\$ 1.800,00
2	KUSTU OPERASIONAL				
	Stationary	Ls	1,00	\$ 1.200,00	\$ 1.200,00
	Communication	Ls	1,00	\$ 1.200,00	\$ 1.200,00
	Meetings	Ls	1,00	\$ 166,67	\$ 166,67
	Electricity	Ls	1,00	\$ 2.400,00	\$ 2.400,00
	Water	Ls	1,00	\$ 2.400,00	\$ 2.400,00
	Daily, weekly, monthly reports	Ls	1,00	\$ 360,00	\$ 360,00
	Shop drawings, as built drawings	Ls	1,00	\$ 360,00	\$ 360,00
	Quality control report, test report, engineering report, final report	Ls	1,00	\$ 360,00	\$ 360,00
3	KUSTU SERVISU APOIO NIAN				
	Personal protective equipment (PPE)	Ls	1,00	\$ 6.000,00	\$ 6.000,00
4	KUSTU SOSIAL				
	Launching ceremony	Ls	1,00	\$ 750,00	\$ 750,00
	Completion ceremony	Ls	1,00	\$ 750,00	\$ 750,00
				TOTAL COST	\$ 63.046,67

DATA INPUT

Naran Project		Ainaro		Postu Adm	Ainaro		Project Duration	12	Bulan
Municipio		Ainaro							
Suco		Mau Ulo							

No	Nama Alat	Kondisi Operasi (Efisiensi)	Bucket Fill Factor	Kecepatan (Km/Jam)		Jarak Buang (Km)		Jarak Dili - Lokasi	Biaya Sewa Truck		Jarak (Km)
				Kosong	Muat	Back Fill	Disposal		Truck 5,5 ton	\$ 240,72	
A	Earth Works, Sub Base & Base Course										
1	Dump Truck	Baik		30	15	0,2	2,5	106,56	Tronton	\$ 800,00	10,00
2	Excavator	Baik	Mudah	Quarry				Bucket Fill Factor			
3	Buldozer	Sedang		Raihenek Atelu	Quarry of Bedulu River			Kondisi Operasi	Kondisi Lapangan		
4	Wheel Loader	Sedang	Agak Sulit	Raihenek	Quarry of Bedulu River			Mudah	Tanah biasa berpasir, kering		
5	Motor grader	Penyebaran, grading		Fatuk Mota	Quarry of Bedulu River			Agak sulit	Tanah biasa berbatu		
6	Tandem roller	Sedang		Britas	Quarry of Stone Crusher Bedulu (ETIK)			Sulit	Batu pecah hasil ledakan		
B	Surface Works				Presu Material Lokal						
1	Tebal Sub Base Course (m)		0,2		No	Nama Material	Satuan	Harga			
2	Tebal Base Course (m)		0,15		1	Tanah urug	M3	\$ 5,00			
3	Tebal ACBC (m)		0,06		2	Sirtu	M3	\$ 16,00			
4	Tebal ACWC (m)		0,05		3	Pasir urug	M3	\$ 16,00			

C	Bridge, Drainage & Slope Protection Works	
1	Deskripsi	Rasio Bekisting tulir dezenho
2	Beton 10 Mpa	0,0000
3	Beton 15 Mpa	1,2503
4	Beton 20 Mpa	1,2503
5	Beton 25 Mpa	1,2503
6	Beton 30 Mpa	1,2503
7	Concrete Cyclope	1,2503

Presu Material Lokal			
No	Nama Material	Satuan	Harga
1	Tanah urug	M3	\$ 5,00
2	Sirtu	M3	\$ 16,00
3	Pasir urug	M3	\$ 16,00
4	Pasir pasang	M3	\$ 41,67
5	Pasir beton	M3	\$ 43,63
6	Pasir Plesteran	M3	\$ 43,63
7	Batu kali	M3	\$ 14,28
8	Batu belah 15/20	M3	\$ 14,28
9	Batu belah 20/40	M3	
10	River Stone 10/20	M3	\$ -
11	Batu pecah	M3	\$ 49,05
12	Batu pecah 2/3	M3	\$ 49,05
13	Batu pecah 3/5	M3	\$ 49,05
14	Batu pecah 1/2	M3	\$ 49,05
15	Batu pecah 0-5	M3	\$ 49,05
16	Abu Batu	M3	\$ 50,00

Prepara husi:

(Eng. Paulino Abrantes Correia)

Civil Engineer ADN, I.P.

Akompanha husi:

(_____)



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

APPROVAL SHEET SUMMARY OF BILL OF QUANTITY

NAME OF PROJECT : Road Improvement Section 2 : Ainaro Urban Road , L= 24.226
LOCATION OF PROJECT : District Ainaro

No.	Work Description	Amount (USD)
100	GENERAL REQUIREMENTS	\$ -
200	EARTHWORKS	\$ -
300	SUB BASE AND BASE COURSE	\$ -
400	SURFACE COURSE	\$ -
500	BRIDGE CONSTRUCTION	\$ -
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES	\$ -
700	MISCELLANEOUS STRUCTURES	\$ -
800	BIOENGINEERING	\$ -
900	MATERIALS DETAILS	\$ -
A	CONSTRUCTION COST	\$ -
B	CONTRACTOR FEE (10 x A)	\$ -
C	CONTIGENCIES (5% of A)	\$ -
D	OVERHEAD	\$ -
E	TAX 2% (A+B+C+D)	\$ -
F	GRAND TOTAL (A+B+C+D)	\$ -



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

COST ESTIMATE

NAME OF PROJECT : Road Improvement Section 2 : Ainaro Urban Road , L= 24.226
 LOCATION OF PROJECT : District Ainaro

No.	Work Description	Unit	Quantity	Unit Price (USD)	Amount (USD)
100	GENERAL REQUIREMENTS				
102.1.1	Mobilization Requirement for All Contract	L.s	1,00	\$ -	\$ -
102.1.4	Demobilization of All Contract	L.s	1,00	\$ -	\$ -
103	Field Office and Facilities for the Contractor				
104	Offices and Accommodation for the Engineer	L.s	1,00	\$ -	\$ -
105	Vehicles for the Engineer (2 units of 4 WD Cars 2 units of Motorbikes)	L.s	1,00	\$ -	\$ -
106.1	Laboratory Testing Service	L.s	1,00	\$ -	\$ -
106.2	Drilling, Including SPT and Report	L.s	1,00	\$ -	\$ -
108	Traffic Management System & Safety	L.s	1,00	\$ -	\$ -
109	Field Engineering				
114	Environment Safeguard	L.s	1,00	\$ -	\$ -
115 (1)	Relocation of Existing Phone Utility Pole	Each	44,00	\$ -	\$ -
115 (2)	Relocation of Existing Electric Utility Pole - Low Voltage	Each	44,00	\$ -	\$ -
115(4)	Relocation of Existing Water Supply Utility Pipes & water tanks	L.s	1,00	\$ -	\$ -
	<i>Sub Total 100</i>				\$ -
200	EARTHWORKS				
201(1)	Clearing and Grubbing	Hectare	17,19	\$ -	\$ -
202(3)	Removal of Pavement, Sidewalks, Curbs, etc.	Sq.m	7.088,00	\$ -	\$ -
202(4)	Removal of Existing Pipe, Culvert and Lined Drain	Ln.m	26.150,70	\$ -	\$ -
203(2)	Surplus Common Excavation	Cu.m	105.849,33	\$ -	\$ -
204(1)	Structure Excavation	Cu.m	6.125,70	\$ -	\$ -
204(2)	Bridge Excavation	Cu.m	1.018,48	\$ -	\$ -
205(1)	Common Embankment (From Surplus Excavation)	Cu.m	44.129,34	\$ -	\$ -
205(3)	Granular Selected Embankment	Cu.m	8.037,40	\$ -	\$ -
206(2)	Subgrade preparation (Existing pavement)	Sq.m	96.080,00	\$ -	\$ -
206(3)	Subgrade preparation (Unsuitable material)	Sq.m	67.574,70	\$ -	\$ -
	<i>Sub Total 200</i>				\$ -
300	SUB BASE AND BASE COURSE				
302.1	Aggregate Base Class C	Cu.m	7.462,97	\$ -	\$ -
303(1)	Aggregate Base Class A	Cu.m	24.241,04	\$ -	\$ -
303(2)	Aggregate Base Class B	Cu.m	25.196,56	\$ -	\$ -
	<i>Sub Total 300</i>				\$ -
400	SURFACE COURSE				
402	Prime Coat	Liter	144.545,19	\$ -	\$ -
411(5a)	Asphaltic Concrete - Wearing Course (AC-WC) 5 cm	Sq.m	144.677,69	\$ -	\$ -
	<i>Sub Total 400</i>				\$ -
500	BRIDGE CONSTRUCTION				
501	Piling Ø 600mm	m	307,20	\$ -	\$ -
502	Railing	m	1.100,40	\$ -	\$ -
505	Reinforcing Steel	Kg	1.080.306,38	\$ -	\$ -
506(1)	Structural Concrete, Class A (f'c 25 M.Pa)	Cu.m	4.610,16	\$ -	\$ -
506(1).a	Structural Concrete, Class A (f'c 35 M.Pa)	Cu.m	4,37	\$ -	\$ -
506(2)	Structural Concrete, Class B (f'c >10 M.Pa)	Cu.m	170,06	\$ -	\$ -
512(4)	Elastomeric Bearing Type 3 (450x400x45) mm3	Each	60,00	\$ -	\$ -
	<i>Sub Total 500</i>				\$ -
600	DRAINAGE AND SLOPE PROTECTION STRUCTURES				
602(1.a)	Underdrain 40x50 Cm (Description)	Ln.m	272,20	\$ -	\$ -
602(1.c)	Underdrain 60 x 80 Cm (Description)	Ln.m	5.873,24	\$ -	\$ -
602(1.d)	Underdrain 100 x 80 Cm (Description)	Ln.m	2.720,00	\$ -	\$ -
602(1.e)	Underdrain 120 x 100 Cm (Description)	Ln.m	8.027,00	\$ -	\$ -
603(1)	Manholes	Each	3.331,00	\$ -	\$ -
603(2)	Inlets, type	Each	6.657,00	\$ -	\$ -
606	Stone Masonry	Cu.m	25.144,92	\$ -	\$ -

610	Gabions	Cu.m	1.785,00	\$ -	\$ -
	<i>Sub Total 600</i>				
700	MISCELLANEOUS STRUCTURES				
701(1)	Concrete Curb	Ln.m	19.819,00	\$ -	\$ -
701(2)	Concrete Gutter	Ln.m	19.550,00	\$ -	\$ -
702	Sidewalk with Difable	Sq.m	33.843,00	\$ -	\$ -
703(5)	Street Lighting	Each	368,00	\$ -	\$ -
706(1)	Warning Signs	Each	701,00	\$ -	\$ -
706(2)	Regulatory Signs	Each	78,00	\$ -	\$ -
706(3)	Informatory Signs	Each	22,00	\$ -	\$ -
707(1)	Pavement Markings (Reflective)	Sq.m	6.238,41	\$ -	\$ -
	<i>Sub Total 700</i>				
800	BIOENGINEERING				
801(1)	Nursery establishment operation and management	Ls	1,00	\$ -	\$ -
801(2)	Grass slips production	Sq.m	2.340,00	\$ -	\$ -
803(1)	Slope trimming and preparation	Sq.m	2.340,00	\$ -	\$ -
805(4)	Planting of Tree/Shrub, Bamboo & Hard wood Cuttings	Each	656,00	\$ -	\$ -
808(2)	Maintenance and Aftercare	Ls	1,00	\$ -	\$ -
	<i>Sub Total 800</i>				
900	MATERIALS DETAILS				
904(12)	Bed Course Material	Cu.m	1.792,00	\$ -	\$ -
	<i>Sub Total 900</i>				
	TOTAL				



AGÊNCIA DE DESENVOLVIMENTO NACIONAL, I. P.

OVERHEAD

NAME OF PROJECT :Road Improvement Section 2 : Ainaro Urban Road , L= 24.226
LOCATION OF PROJECT : District Ainaro

NO	DESKRISAUN	UNIT	QTY	UNIT RATE US \$	AMOUNT US \$
1	PROJECT TEAM				
	Project Manager	Ls	1,00	\$ -	\$ -
	Site Manager	Ls	1,00	\$ -	\$ -
	Site Engineer	Ls	1,00	\$ -	\$ -
	Surveyor	Ls	1,00	\$ -	\$ -
	Logistics	Ls	1,00	\$ -	\$ -
	Administration	Ls	1,00	\$ -	\$ -
	Cleaning Staff	Ls	1,00	\$ -	\$ -
	Security	Ls	1,00	\$ -	\$ -
2	KUSTU OPERASIONAL				
	Stationary	Ls	1,00	\$ -	\$ -
	Communication	Ls	1,00	\$ -	\$ -
	Meetings	Ls	1,00	\$ -	\$ -
	Electricity	Ls	1,00	\$ -	\$ -
	Water	Ls	1,00	\$ -	\$ -
	Daily, weekly, monthly reports	Ls	1,00	\$ -	\$ -
	Shop drawings, as built drawings	Ls	1,00	\$ -	\$ -
	Quality control report, test report, engineering report, final report	Ls	1,00	\$ -	\$ -
3	KUSTU SERVISU APOIO NIAN				
	Personal protective equipment (PPE)	Ls	1,00	\$ -	\$ -
4	KUSTU SOSIAL				
	Launching ceremony	Ls	1,00	\$ -	\$ -
	Completion ceremony	Ls	1,00	\$ -	\$ -
				TOTAL COST	\$ -