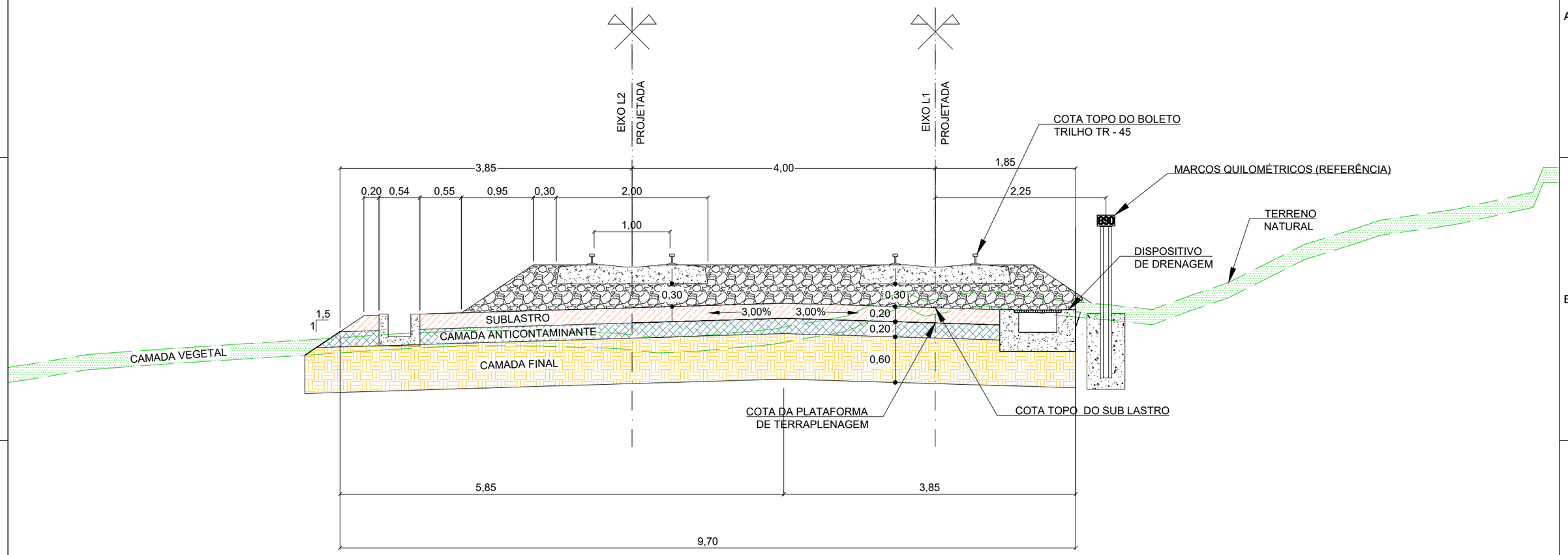
EST. 108+880,000



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	E	IMR	PARA CONSTRUÇÃO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 2017110538	02/02/23
RESP.TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

TIPO DE EMISSÃO:

(A) PRELIMINAR (B) PARA APROVAÇÃO (C) PARA CONHECIMENTO (D) PARA COTAÇÃO (E) PARA CONSTRUÇÃO (F) CONFORME COMPRADO (G) CONFORME CONSTRUIDO (H) CANCELADO

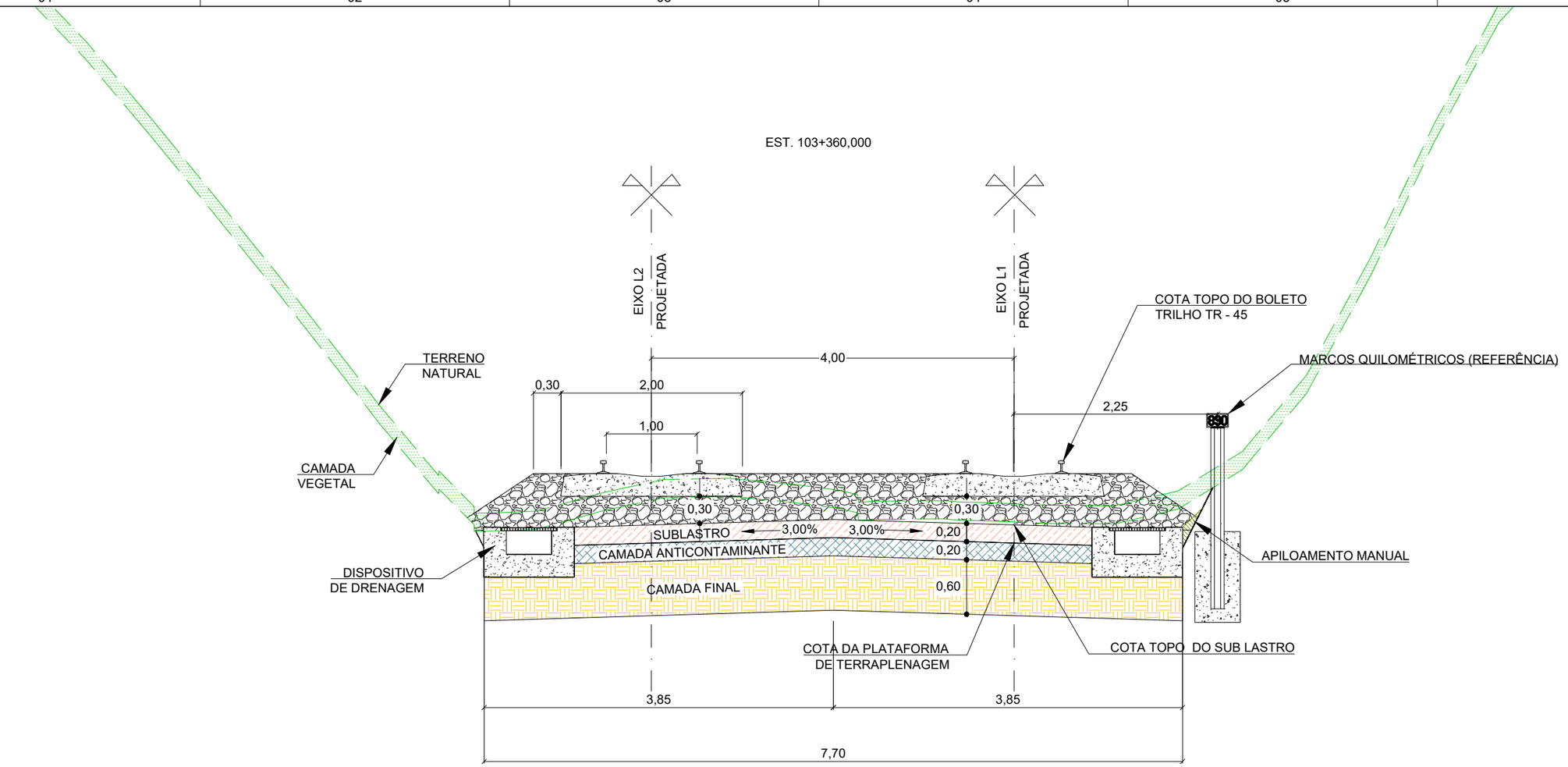
Piauí GOVERNO DO ESTADO — TRANSPORTES Secretaria de estado dos transportes / SETRANS

CONSÓRCIO: ENEFER — CAVA INFRAESTRUTURA

PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1102	01/06	02/2023	0



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	E	IMR	PARA CONSTRUÇÃO

TIPO DE EMISSÃO:

(A) PRELIMINAR (B) PARA APROVAÇÃO (C) PARA CONHECIMENTO (D) PARA COTAÇÃO (E) PARA CONSTRUÇÃO (F) CONFORME COMPRADO (G) CONFORME CONSTRUIDO (H) CANCELADO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 2017010538	02/02/23
RESP. TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

Piauí GOVERNO DO ESTADO

TRANSPORTES
Secretaria de estado dos transportes / SETRANS

CONSÓRCIO: ENEFER CAVA INFRAESTRUTURA

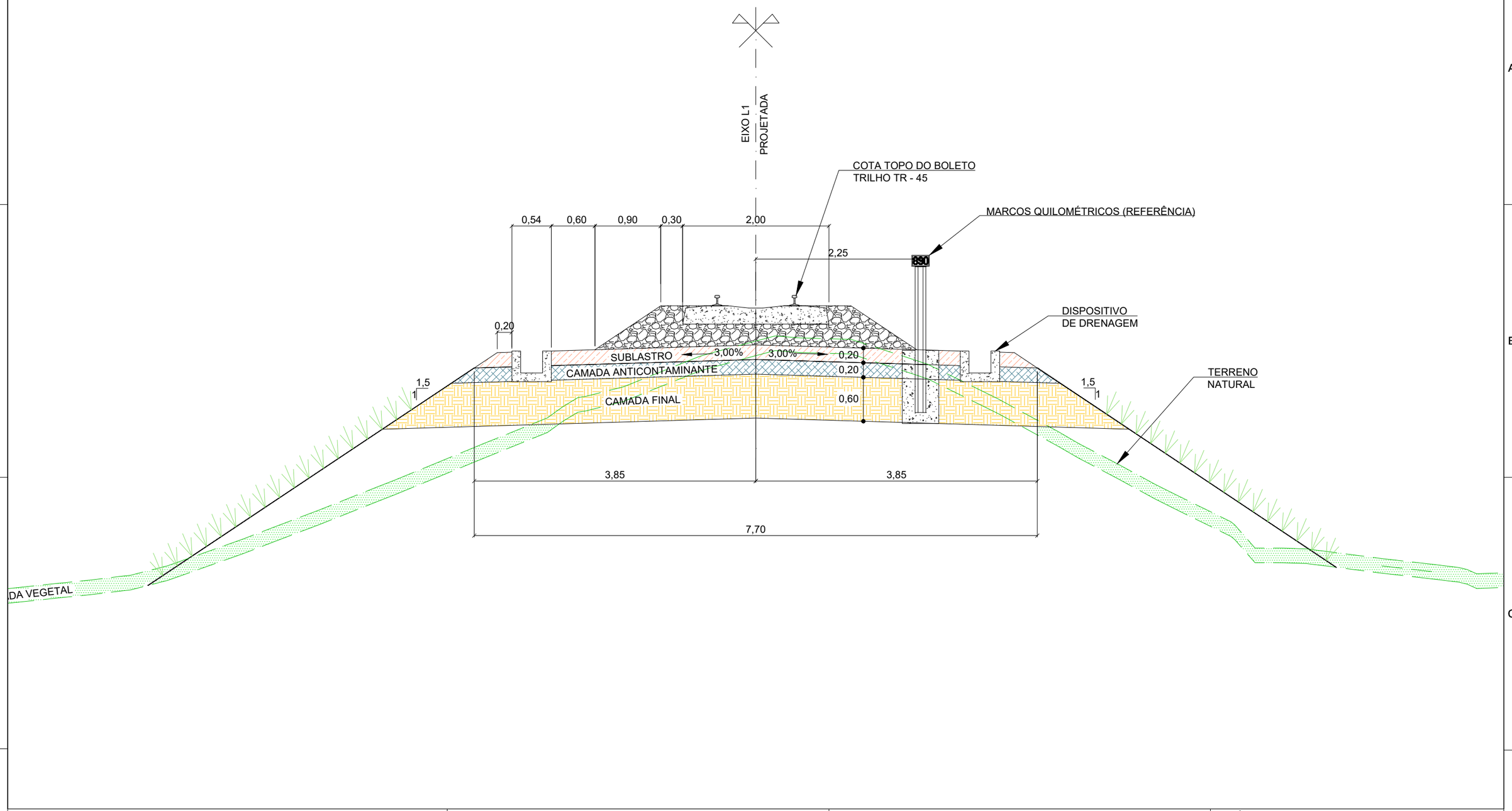
PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1103	02/06	02/2023	0

Formato (A3)

EST. 101+040,000



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	B	IMR	PARA CONSTRUÇÃO

TIPO DE EMISSÃO:

(A) PRELIMINAR
(B) PARA APROVAÇÃO
(C) PARA CONHECIMENTO
(D) PARA COTAÇÃO
(E) PARA CONSTRUÇÃO
(F) CONFORME COMPRADO
(G) CONFORME CONSTRUIDO
(H) CANCELADO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 2017110538	02/02/23
RESP. TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

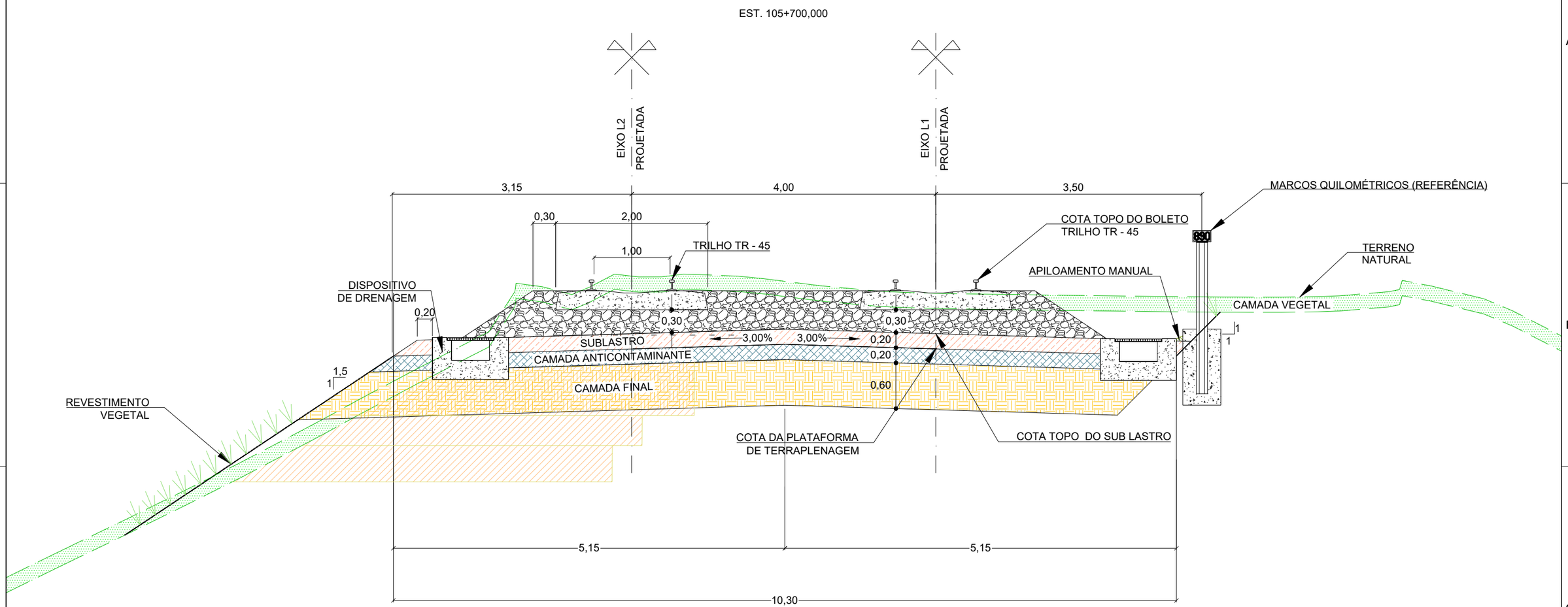
Piauí GOVERNO DO ESTADO
TRANSPORTES
Secretaria de estado dos transportes / SETRANS

CONSÓRCIO: ENEFER CAVA INFRAESTRUTURA

PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1104	03/06	02/2023	0



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	B	IMR	PARA CONSTRUÇÃO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 201710538	02/02/23
RESP. TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

TIPO DE EMISSÃO:

(A) PRELIMINAR
(B) PARA APROVAÇÃO
(C) PARA CONHECIMENTO
(D) PARA COTAÇÃO
(E) PARA CONSTRUÇÃO
(F) CONFORME COMPRADO
(G) CONFORME CONSTRUIDO
(H) CANCELADO

Piauí GOVERNO DO ESTADO
TRANSPORTES
Secretaria de estado dos transportes / SETRANS

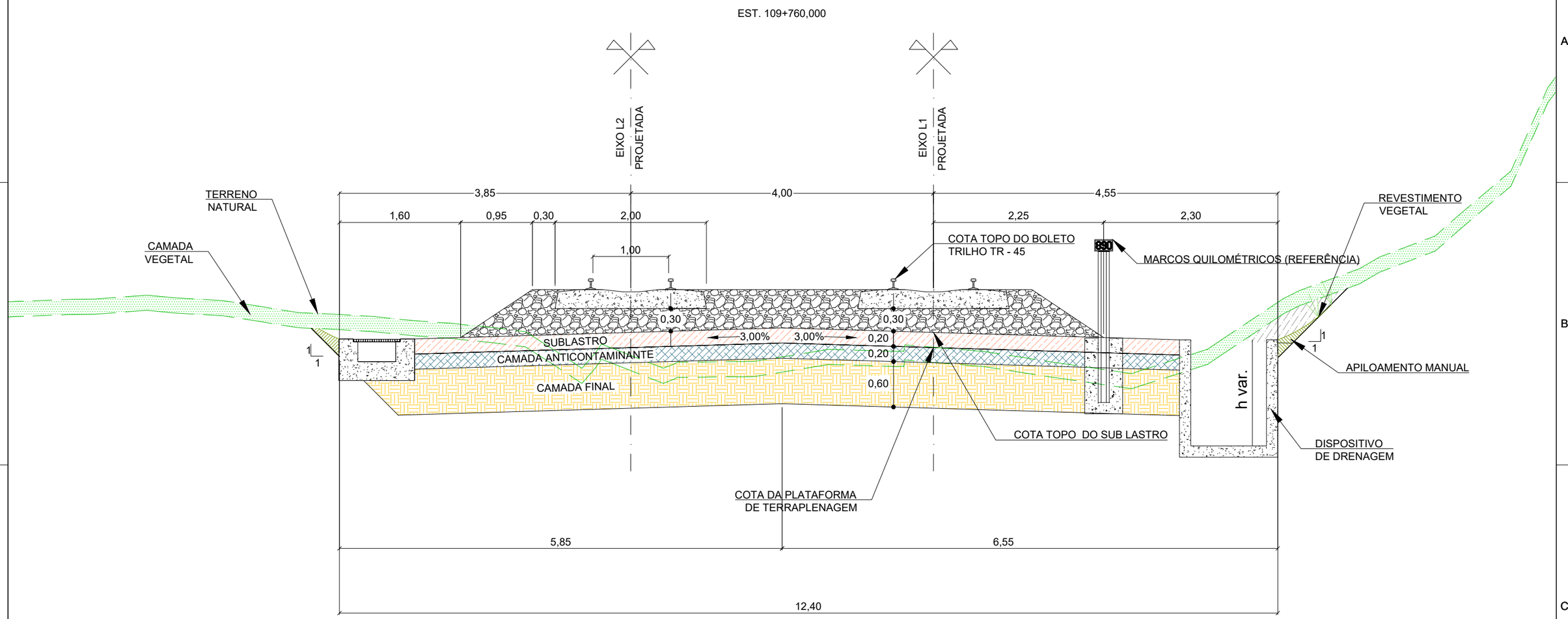
CONSÓRCIO: ENEFER CAVA INFRAESTRUTURA

PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1105	04/06	02/2023	0

Formato (A3)



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	B	IMR	PARA CONSTRUÇÃO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 2017010538	02/02/23
RESP. TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

TIPO DE EMISSÃO:

(A) PRELIMINAR (B) PARA APROVAÇÃO (C) PARA CONHECIMENTO (D) PARA COTAÇÃO (E) PARA CONSTRUÇÃO (F) CONFORME COMPRADO (G) CONFORME CONSTRUIDO (H) CANCELADO

Piauí GOVERNO DO ESTADO — TRANSPORTES Secretaria de estado dos transportes / SETRANS

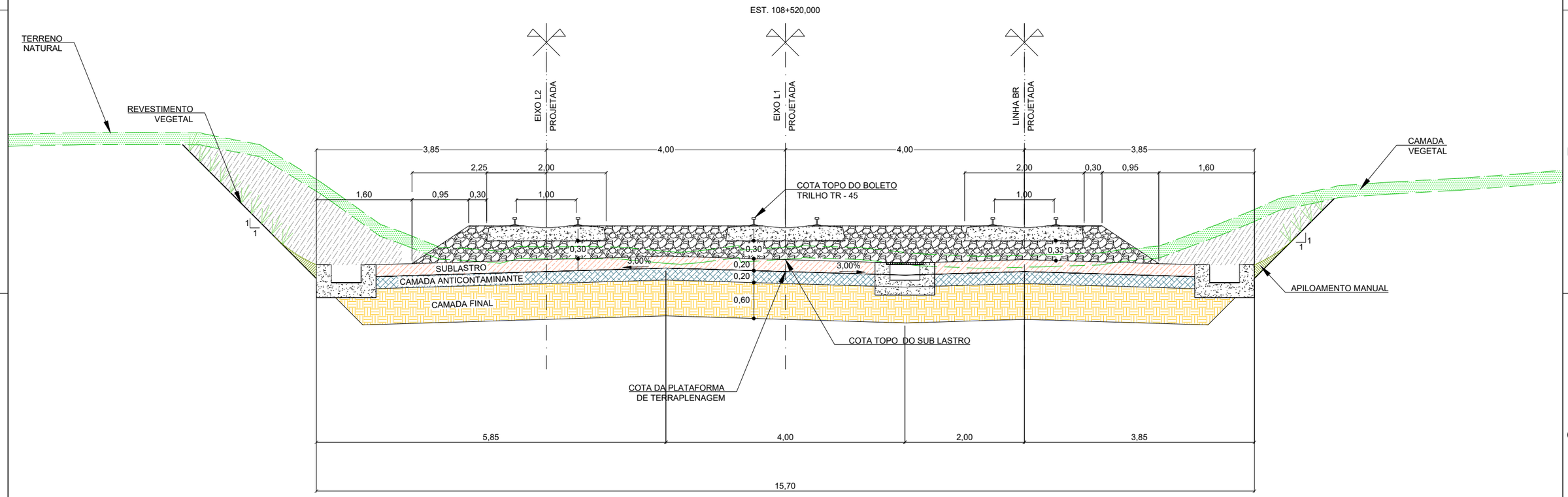
CONSÓRCIO: ENEFER — CAVA INFRAESTRUTURA

PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1106	05/06	02/2023	0

Formato (A3)



NOTAS:

EMISSÕES:

DATA	TIPO	POR	DESCRIÇÃO
02/02/23	B	IMR	PARA CONSTRUÇÃO

RESPONSÁVEL:	DATA:	RESPONSÁVEL:	DATA:
APROVAÇÃO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	ELABORAÇÃO: Israel M. Rodrigues - CREA/RJ 2017110538	02/02/23
RESP.TÉCNICO: Fabio Lucien D. Maciel - CREA/RJ 2014121743	02/02/23	VERIFICAÇÃO: João Bosco F. de Souza - CREA/RJ 1972100711	02/02/23

TIPO DE EMISSÃO:

(A) PRELIMINAR
(B) PARA APROVAÇÃO
(C) PARA CONHECIMENTO
(D) PARA COTAÇÃO
(E) PARA CONSTRUÇÃO
(F) CONFORME COMPRADO
(G) CONFORME CONSTRUIDO
(H) CANCELADO

Piauí GOVERNO DO ESTADO

TRANSPORTES
Secretaria de estado dos transportes / SETRANS

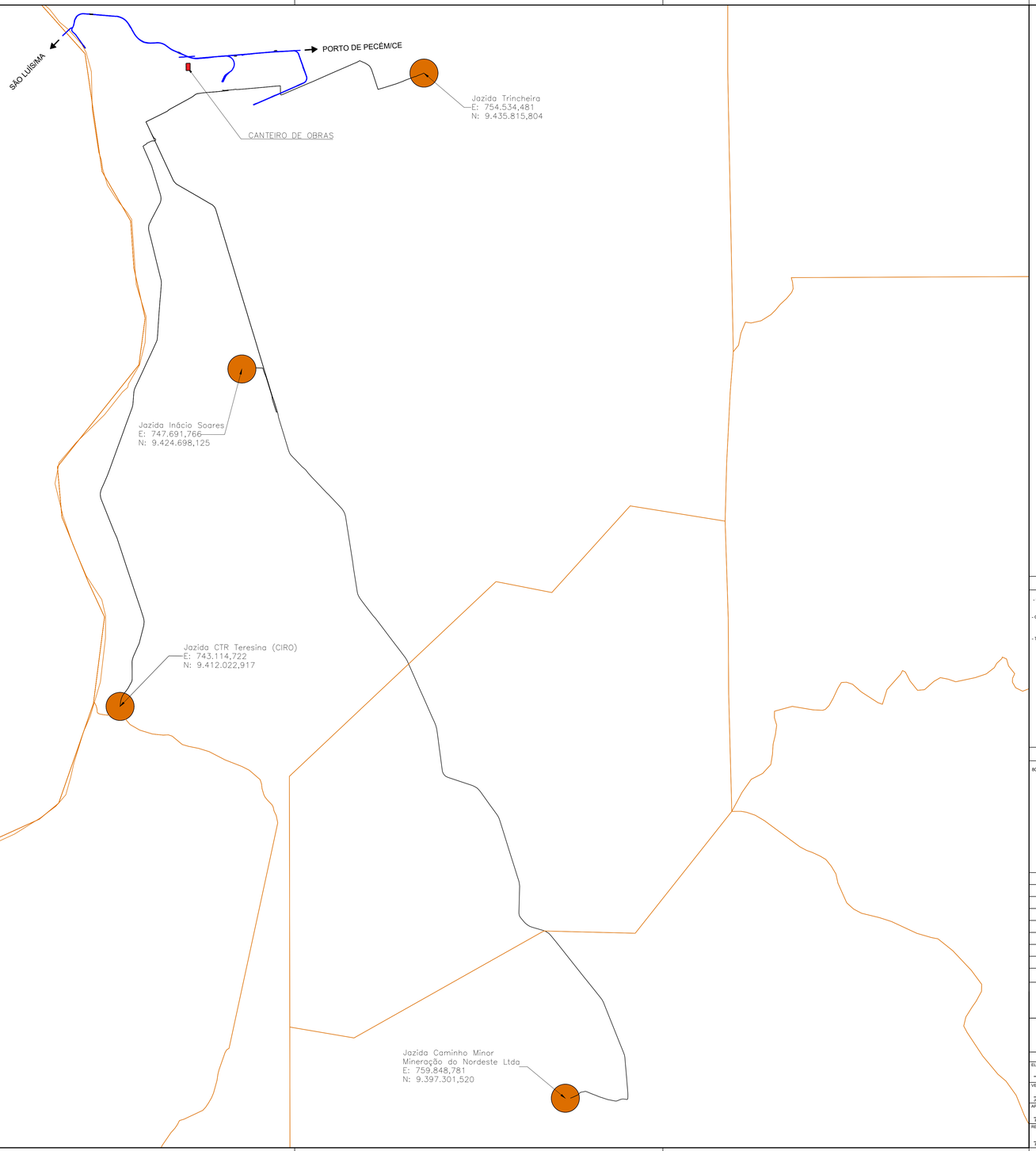
CONSÓRCIO: ENEFER CAVA INFRAESTRUTURA

PROJETO: METRÔ DE TERESINA - MTE
OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS
LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ

TÍTULO: PROJETO EXECUTIVO - TERRAPLENAGEM
SEÇÃO TIPO

ESCALA	DOCUMENTO Nº	FOLHA	DATA.	REV.
INDICADA	MTE-VIA-TER-PE-DE-1107	06/06	02/2023	0

Formato (A3)



NOTAS:

- DEVERÁ SER OBSERVADA A ESPECIFICAÇÃO TÉCNICA ET-VALEC Nº80-ES-050A-18-8001 (LANÇAMENTO, MONTAGEM E ACABAMENTO DA VP.)
- OS MARCOS DE REFERÊNCIA PLANIALTIMÉTRICOS A SEREM IMPLANTADOS EM OAEs (PONTES E VIADUTOS) E PASSAGENS INFERIORES, DEVERÃO SER DEFINIDOS PELA FISCALIZAÇÃO DA VALEC.
- TOLERÂNCIA EM MILÍMETRO (mm)

ARQUIVO TÉCNICO | EM: __/__/__

- [ ] LIBERADO PARA EMISSÃO
- [ ] LIBERADO COM COMENTÁRIOS
- [ ] NÃO LIBERADO

ASSINATURA | EM: __/__/__

ESTE DOCUMENTO É DE TOTAL E EXCLUSIVA RESPONSABILIDADE DO PROJETISTA.

LIBERADO P/ EXECUÇÃO DA OBRA

ASSINATURA | EM: __/__/__

APROVAÇÃO | EM: __/__/__

DOCUMENTOS DE REFERÊNCIA:

80-DES-3100G-18-00005 (SEÇÃO TIPO DE SUPERESTRUTURA).

DATA	TIPO	POR	DESCRIÇÃO
22/09/2022	E	IMR	PARA CONSTRUÇÃO

EMISSÕES:

TIPO DE EMISSÃO

(A) PRELIMINAR
(B) PARA LIBERAÇÃO
(C) PARA CONHECIMENTO
(D) PARA COTAÇÃO
(E) PARA CONSTRUÇÃO
(F) CONFORME COMPRADO
(G) CONFORME CONSTRUÍDO
(H) CANCELADO

Piauí — TRANSPORTES — Secretaria de estado dos transportes / SETRANS

CONSORCIO: ENEFER | CAVA INFRAESTRUTURA

RESPONSÁVEL:	DATA:	PROJETO: METRÔ DE TERESINA - MTE OBRAS DE REVITALIZAÇÃO, MODERNIZAÇÃO E MELHORIAS LINHA 1 - SUDESTE - ESTAÇÕES ALBERTO SILVA - ITARARÉ	
ELABORAÇÃO: Israel M. Marques - CREA/PA 2017710538	22/09/2022		
VERIFICAÇÃO: João Bosco Ferreira - CREA/RJ 197210071	22/09/2022	TÍTULO: PROJETO DE TERRAPLENAGEM CROQUI DE JAZIDAS	FOLHA: 01
APROVAÇÃO: Fabio Lucian D. Maciel - CREA/RJ 2014121743	22/09/2022		
RESP. TÉCNICO: Fabio Lucian D. Maciel - CREA/RJ 2014121743	22/09/2022	ESCALA: INDICADA	DOCUMENTO Nº: MTE-VIA-TER-PE-DE-1201 — REV: 0

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
											100+000,000	INÍCIO	9.436.755,091	741.807,377	65,092	59,957	5,135															
											100+020,000		9.436.771,292	741.795,650	65,092	59,882	5,210															
											100+040,000		9.436.787,494	741.783,924	65,092	59,846	5,246															
											100+060,000		9.436.803,695	741.772,198	65,092	59,806	5,286															
											100+080,000		9.436.819,897	741.760,471	65,092	59,870	5,222															
											100+100,000		9.436.836,099	741.748,745	65,092	59,711	5,381															
											100+120,000		9.436.852,300	741.737,019	65,092	59,575	5,517															
											100+140,000		9.436.868,502	741.725,292	65,092	59,469	5,623															
											100+160,000		9.436.884,704	741.713,566	65,092	59,523	5,569															
											100+180,000		9.436.900,905	741.701,840	65,092	59,653	5,439															
											100+200,000		9.436.917,107	741.690,113	65,092	59,482	5,610															
											100+220,000		9.436.933,309	741.678,387	65,092	59,494	5,598															
											100+240,000		9.436.949,510	741.666,661	65,092	59,511	5,581															
											100+260,000		9.436.965,712	741.654,934	65,092	59,523	5,569															
											100+280,000		9.436.981,914	741.643,208	65,092	59,488	5,604															
											100+300,000		9.436.998,115	741.631,482	65,092	59,444	5,648															
											100+320,000		9.437.014,317	741.619,755	65,092	59,389	5,703															
											100+333,395	PC	9.437.025,168	741.611,902	65,092	59,309	5,783															
											100+340,000		9.437.030,525	741.608,038	65,092	59,272	5,820															
											100+345,903		9.437.035,323	741.604,600	65,092	59,239	5,853															
											100+358,411	PT	9.437.045,524	741.597,361	65,092	59,248	5,844															
											100+360,000		9.437.046,823	741.596,446	65,092	59,250	5,842															
											100+380,000		9.437.063,170	741.584,923	65,092	59,267	5,825															
											100+400,000		9.437.079,517	741.573,401	65,092	59,206	5,886															
											100+420,000		9.437.095,864	741.561,878	65,092	59,070	6,022															
											100+440,000		9.437.112,211	741.550,355	65,092	58,920	6,172															
											100+460,000		9.437.128,558	741.538,832	65,092	58,918	6,174															
											100+480,000		9.437.144,905	741.527,310	65,092	59,010	6,082															
											100+500,000		9.437.161,252	741.515,787	65,092	59,084	6,008															
											100+520,000		9.437.177,599	741.504,264	65,092	59,092	6,000															
											100+540,000		9.437.193,946	741.492,741	65,092	59,042	6,050															
											100+560,000		9.437.210,294	741.481,219	65,095	58,975	6,120															
											100+580,000		9.437.226,641	741.469,696	65,105	58,983	6,122															
											100+587,949	PC	9.437.233,138	741.465,116	65,111	58,982	6,130															
											100+600,000		9.437.242,850	741.457,983	65,122	58,998	6,125															
											100+620,000		9.437.258,334	741.445,330	65,146	59,059	6,086															
											100+620,612		9.437.258,795	741.444,927	65,147	59,064	6,082															
											100+640,000		9.437.272,970	741.431,705	65,173	59,195	5,978															
											100+653,275	PT	9.437.282,187	741.422,152	65,191	59,275	5,916															
											100+660,000		9.437.286,752	741.417,214	65,200	59,323	5,877															
											100+680,000		9.437.300,327	741.402,526	65,226	59,427	5,799															
											100+700,000		9.437.313,902	741.387,839	65,253	59,624	5,629															
											100+720,000		9.437.327,477	741.373,152	65,280	59,724	5,556															
											100+740,000		9.437.341,052	741.358,465	65,307	59,942	5,365															
											100+760,000		9.437.354,627	741.343,777	65,334	60,026	5,308															
											100+776,297	PC	9.437.365,689	741.331,810	65,356	60,185	5,171															
											100+780,000		9.437.368,251	741.329,136	65,361	60,213	5,148															
											100+800,000		9.437.383,647	741.316,420	65,388	60,527	4,860															
											100+820,000		9.437.401,225	741.306,947	65,415	61,021	4,393															
											100+840,000		9.437.420,311	741.301,080	65,442	60,974	4,468															
											100+845,326		9.437.425,556	741.300,158	65,449	61,024	4,425															
											100+860,000		9.437.440,175	741.299,044	65,468	61,033	4,435															
											100+880,000		9.437.460,055	741.300,917	65,495	61,484	4,012															
-4,576	66,162	-3,850	65,437	-3,00%							100+900,000		9.437.479,189	741.306,627	65,552	66,290	-0,738							3,850	65,437	3,00%					4,175	65,761
-4,569	66,175	-3,850	65,456	-3,00%							100+914,355	PT	9.437.492,051	741.312,974	65,572	66,400	-0,828							3,850	65,456	3,00%					4,703	66,309
-4,472	66,085	-3,850	65,464	-3,00%							100+920,000		9.437.496,925	741.315,822	65,579	66,311	-0,732							3,850	65,464	3,00%					4,541	66,155
-4,308	65,985	-3,850	65,527	-3,00%							100+940,000		9.437.514,194	741.325,911	65,643	66,377	-0,735							3,850	65,527	3,00%					3,918	65,482
											100+960,000		9.437.531,462	741.336,001	65,784	65,878	-0,094															
											100+963,320	PC	9.437.534,329	741.337,676	65,815	63,531	2,284															
-8,021	63,092	-3,850	65,873	-3,00%							100+980,000		9.437.548,957	741.345,686	65,989	66,602	-0,614							3,850	65,873	3,00%					7,824	63,224
-8,365	63,109	-3,850	66,119	-3,00%							101+000,000		9.437.567,050	741.354,201	66,235	66,669	-0,435							3,850	66,119	3,00%					4,130	66,399
-8,602	62,994	-3,850	66,162	-3,00%							101+003,530		9.437.570,301	741.355,577	66,278	66,752	-0,474							3,850	66,162	3,00%					4,087	66,399
-8,840	63,038	-3,850	66,365	-3,00%							101+020,000		9.437.585,670	741.361,491	66,481	66,913	-0,432							3,850	66,365	3,00%					7,940	63,638
-8,187	63,720	-3,850	66,611	-3,00%							101+040,000		9.437.604,734	741.367,525	66,727	67,017	-0,291							3,850	66,611	3,00%					7,863	63,936
-8,395	63,627	-3,850	66,657	-3,00%							101+043,740	PT	9.437.608,342	741.368,511	66,773	67,105	-0,332							3,850	66,657	3,00%					7,755	64,054
-8,339	63,870	-3,850	66,862	-3,00%							101+059,585	PC	9.437.623,652	741.372,596	66,978	67,468	-0,490							3,850	66,862	3,00%					7,816	64,219
-8,344	63,872	-3,850	66,868	-3,00%							101+060,000		9.437.624,052	741.372,702	66,984	67,487	-0,503							3,850	66,868	3,00%					7,830	64,215
-8,455	63,937	-3,850	67,007	-3,00%							101+070,392		9.437.634,123	741.375,268	67,123	67,592	-0,469							3,850	67,007	3,00%					6,600	65,174
-8,607	63,965	-3,850	67,136	-3,00%							101+080,000		9.437.643,478	741.377,454	67,252	67,718	-0,466							3,850	67,136	3,00%					6,603	65,301
-8,663	63,944	-3,850	67,152	-3,00%							101+081,199	PT	9.437.644,649	741.377,714	67,268	67,824	-0,557							3,850	67,152	3,00%					6,594	65,323
-8,914	64,028	-3,850	67,404	-3,00%							101+100,000		9.437.663,007	741.381,771	67,520	68,069	-0,549							3,850	67,404	3,00%					8,439	64,345
-7,633	65,150	-3,850	67,672	-3,00%							101+120,000		9.437.682,536	741.386,086	67,788	68,240	-0,453							3,850	67,672	3,00%					8,934	64,283
											101+140,000		9.437.702,065	741.390,402	67,988	64,145	3,843															
											101+160,000		9.437.721,594	741.394,718	68,182	65,357	2,824															
MURO		-3,149	68,323	-3,00%				-0,715	68,396	3,00%	101+180,000		9.437.741,122	741.399,033	68,375	68,900	-0,525							1,850	68,320	3,00%					2,101	68,695
MURO		-5,510	68,525	-3,00%				-2,025	68,629	3,00%	101+200,000		9.437.760,651	741.403,349	68,568	68,981	-0,412							1,850	68,513	3,00%					2,055	68,820
MURO		-8,105	68,718	-3,00%				-3,319	68,861	3,00%	101+220,000		9.437.780,180	741.407,664	68,762	69,009	-0,247							1,850	68,706	3,00%					MURO	
MURO		-8,332	68,743	-3,00%				-3,443	68,890	3,00%	101+222,527	PC	9.437.782,648	741.408,210	68,786	69,000	-0,214							1,850	68,731	3,00%					MURO	
MURO		-9,500	68,904	-3,00%				-3,898	69,072	3,00%	101+240,000		9.437.799,523	741.412,720	68,955	69,188	-0,233							1,850	68,900	3,00%					MURO	
MURO		-9,923	69,012	-3,00%				-4,134	69,185	3,00%	101+250,990		9.437.809,910	741.416,305	69,061	69,334	-0,273							1,850	69,006	3,00%					MURO	
MURO		-10,089	69,088	-3,00%				-4,039	69,270	3,00%	101+260,000		9.437.818,269	741.419,666	69,149	69,243	-0,095							1,850	69,093	3,00%					MURO	
MURO		-9,950	69,235	-3,00%				-4,050	69,412	3,00%	101+279,452	PT	9.437.835,748	741.428,184	69,291	67,624	1,667							1,850	69,235	3,00%					MURO	
MURO		-9,950	69,238	-3,00%				-4,050	69,415	3,00%	101+280,000		9.437.836,228	741.428,448	69,294	67,701	1,592							1,850	69,238	3,00%					MURO	
MURO		-9,950	69,287	-3,00%				-4,050	69,464	3,00%	101+300,000		9.437.853,760	741.438,074	69,342	69,619	-0,277							1,850	69,287	3,00%					MURO	
MURO		-9,950	69,287	-3,00%				-4,050	69,464	3,00%	101+320,000		9.437.871,291	741.447,699	69,342	69,607	-0,265							1,850	69,287	3,00%					MURO	
MURO		-9,950	69,287	-3,00%				-4,050	69,464	3,00%	101+340,000		9.437.888,822	741.457,325	69,342	69,748	-0,406							1,850	69,287	3,00%					MURO	
MURO		-9,950	69,309	-3,00%				-4,050	69,486	3,00%	101+360,000		9.437.906,354	741.466,950	69,365	70,041	-0,676							1,850	69,309	3,00%					2,140	69,743
MURO		-9,950	69,313	-3,00%				-4,050	69,490	3,00%	101+361,330	PC	9.437.907,520	741.467,591	69,369	70,065	-0,696							1,850	69,313	3,00%					2,154	69,769
MURO		-9,716	69,409	-3,00%				-3,941	69,583	3,00%	101+380,000		9.437.923,484	741.477,259	69,465	70,296	-0,832							1,850	69,409	3,00%					2,255	70,016
MURO		-8,847	69,587	-3,00%				-3,505	69,747	3,00%	101+400,000		9.437.939,611	741.489,077	69,642	70,562	-0,920							1,850	69,587	3,00%					2,299	70,260
MURO		-8,617	69,624	-3,00%				-3,388	69,781	3,00%	101+403,690		9.437.942,465	741.491,415	69,679	70,596	-0,917							1,850	69,623	3,00%					2,312	70,317
MURO		-7,350	69,786	-3,00%				-2,744	69,924	3,00%	101+420,000		9.437.954,598	741.502,310	69,842	70,716	-0,874							1,850	69,787	3,00%					2,341	70,524
MURO		-5,935	69,985	-3,00%				-2,010	70,102	3,00%	101+440,000		9.437.968,321	741.516,850	70,042	70,920	-0,878							1,850	69,987	3,00%					2,364	70,758
-6,001	70,348	-5,850	70,047	-3,00%				-2,000	70,163	3,00%	101+446,050	PT	9.437.972,206	741.521,487	70,103	71,046	-0,944							1,850	70,047	3,00%					2,240	70,828
-6,184	70,762	-5,850	70,094	-3,00%				-2,000	70,209	3,00%	101+450,718	PC	9.437.975,155	741.525,106	70,149	71,084	-0,935							1,850	70,094	3,00%					2,255	70,904
-6,212	70,910	-5,850	70,187	-3,00%				-2,000	70,302	3,00%	101+460,000		9.437.980,863	741.532,424	70,242	71,206	-0,964							1,850	70,187	3,00%					2,270	71,025
-6,130	70,915	-5,850	70,355	-3,00%				-2,000	70,471	3,00%	101+476,865		9.437.990,426	741.546,311	70,411	71,254	-0,844							1,850	70,355	3,00%					2,213	71,081
-6,171	71,028	-5,850	70,387	-3,00%				-2,000	70,502	3,00%	101+480,000		9.437.992,085	741.548,971	70,442	71,300	-0,858							1,850	70,387	3,00%					2,211	71,107
-6,193	71,258	-5,850	70,573	-3,00%				-2,000	70,688	3,00%	101+500,000		9.438.001,759	741.566,468	70,628	71,482	-0,854							1,850	70,573	3,00%					2,214	71,300
-6,217	71,333	-5,850	70,598	-3,00%				-2,000	70,714	3,00%	101+503,012	PT	9.438.003,076	741.569,176	70,654	71,492	-0,838							1,850	70,598	3,00%					2,202	71,303
-6,348	71,728	-5,850	70,732	-3,00%				-2,000	70,847	3,00%	101+520,000		9.438.010,403	741.584,503	70,787	71,519	-0,732							1,850	70,732	3,00%					2,209	71,448
-6,417	71,908	-5,850	70,775	-3,00%				-2,000	70,891	3,00%	101+526,012	PC	9.438.012,995	741.589,928	70,831	71,543	-0,713							1,850	70,775	3,00%					2,180	71,435

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-6,580	72,336	-5,850	70,877	-3,00%				-2,000	70,992	3,00%	101+540,000		9.438.018,759	741.602,672	70,932	71,549	-0,617							1,850	70,877	3,00%					2,131	71,439
-6,667	72,656	-5,850	71,022	-3,00%				-2,000	71,137	3,00%	101+560,000		9.438.026,050	741.621,292	71,077	71,540	-0,463							1,850	71,022	3,00%					2,109	71,540
-6,696	72,859	-5,850	71,167	-3,00%				-2,000	71,282	3,00%	101+580,000		9.438.032,199	741.640,320	71,222	71,522	-0,300							1,850	71,167	3,00%					1,853	71,173
-6,560	72,732	-5,850	71,312	-3,00%				-2,000	71,427	3,00%	101+600,000		9.438.037,185	741.659,686	71,367	71,523	-0,156							1,850	71,312	3,00%					3,403	71,265
-6,844	73,391	-5,850	71,404	-3,00%				-2,000	71,519	3,00%	101+612,715		9.438.039,741	741.672,140	71,459	71,583	-0,124							1,850	71,404	3,00%					3,499	71,354
-6,685	73,126	-5,850	71,457	-3,00%				-2,000	71,572	3,00%	101+620,000		9.438.040,989	741.679,318	71,512	71,642	-0,130							1,850	71,457	3,00%					3,298	71,413
-6,182	72,265	-5,850	71,602	-3,00%				-2,000	71,717	3,00%	101+640,000		9.438.043,597	741.699,144	71,657	71,710	-0,053							1,850	71,602	3,00%					3,194	71,561
-5,928	71,903	-5,850	71,747	-3,00%				-2,000	71,862	3,00%	101+660,000		9.438.044,999	741.719,091	71,802	71,716	0,086							1,850	71,747	3,00%					3,607	71,694
-5,873	71,940	-5,850	71,894	-3,00%				-2,000	72,009	3,00%	101+680,000		9.438.045,190	741.739,087	71,949	71,844	0,105							1,850	71,894	3,00%					3,680	71,839
-6,325	72,038	-5,850	72,052	-3,00%				-2,000	72,168	3,00%	101+699,417	PT	9.438.044,217	741.758,477	72,108	71,856	0,251							1,850	72,052	3,00%					3,687	71,997
-6,339	72,042	-5,850	72,057	-3,00%				-2,000	72,173	3,00%	101+700,000		9.438.044,170	741.759,058	72,113	71,862	0,251							1,850	72,057	3,00%					3,662	72,003
-6,212	72,964	-5,850	72,239	-3,00%				-2,000	72,354	3,00%	101+720,000		9.438.042,580	741.778,995	72,294	71,971	0,323							1,850	72,239	3,00%					3,419	72,192
-6,515	72,417	-5,850	72,437	-3,00%				-2,000	72,552	3,00%	101+740,000		9.438.040,991	741.798,932	72,492	71,972	0,520							1,850	72,437	3,00%					3,656	72,382
-7,411	72,590	-5,850	72,637	-3,00%				-2,000	72,752	3,00%	101+760,000		9.438.039,401	741.818,868	72,692	72,020	0,672							1,850	72,637	3,00%					3,642	72,583
-7,962	72,773	-5,850	72,837	-3,00%				-2,000	72,952	3,00%	101+780,000		9.438.037,811	741.838,805	72,892	72,021	0,871							1,850	72,837	3,00%					3,722	72,780
-8,017	72,971	-5,850	73,037	-3,00%				-2,000	73,152	3,00%	101+800,000		9.438.036,221	741.858,742	73,092	72,063	1,029							1,850	73,037	3,00%					4,080	72,970
-7,113	73,199	-5,850	73,237	-3,00%				-2,000	73,352	3,00%	101+820,000		9.438.034,631	741.878,679	73,292	72,258	1,034							1,850	73,237	3,00%					3,655	73,182
-8,206	73,366	-5,850	73,437	-3,00%				-2,000	73,552	3,00%	101+840,000		9.438.033,041	741.898,615	73,492	72,390	1,102							1,850	73,437	3,00%					4,851	73,346
-8,396	73,543	-5,955	73,617	-3,00%				-2,068	73,733	3,00%	101+857,914	PC	9.438.031,617	741.916,473	73,671	72,346	1,326							1,850	73,616	3,00%					4,727	73,529
-8,213	73,571	-6,034	73,637	-3,00%				-2,094	73,755	3,00%	101+860,000		9.438.031,450	741.918,552	73,692	72,347	1,345							1,850	73,637	3,00%					4,725	73,550
-7,460	73,689	-6,584	73,715	-3,00%				-2,381	73,842	3,00%	101+868,234		9.438.030,770	741.926,758	73,770	72,367	1,403							1,850	73,715	3,00%					4,643	73,631
MURO		-7,536	73,801	-3,00%				-2,843	73,941	3,00%	101+878,555	PT	9.438.029,870	741.937,039	73,856	72,421	1,435							2,800	73,772	3,00%					4,435	73,723
MURO		-7,673	73,812	-3,00%				-2,911	73,954	3,00%	101+880,000		9.438.029,741	741.938,479	73,867	72,428	1,439							2,800	73,783	3,00%					4,402	73,735
MURO		-9,478	73,935	-3,00%				-3,795	74,106	3,00%	101+900,000		9.438.027,945	741.958,398	73,992	72,576	1,416							2,800	73,908	3,00%					3,748	73,880
MURO		-9,791	73,963	-3,00%				-3,933	74,139	3,00%	101+906,362	PC	9.438.027,374	741.964,735	74,021	72,597	1,425							2,800	73,937	3,00%					3,771	73,908
MURO		-9,924	74,002	-3,00%				-4,023	74,179	3,00%	101+916,683		9.438.026,474	741.975,016	74,058	72,614	1,444							2,800	73,974	3,00%					3,783	73,945
MURO		-9,938	74,011	-3,00%				-4,038	74,188	3,00%	101+920,000		9.438.026,196	741.978,321	74,067	72,649	1,418							2,800	73,983	3,00%					3,733	73,955
MURO		-9,950	74,026	-3,00%				-4,050	74,203	3,00%	101+927,003	PT	9.438.025,627	741.985,301	74,081	72,728	1,353							2,800	73,997	3,00%					3,580	73,974
MURO		-9,950	74,037	-3,00%				-4,050	74,214	3,00%	101+940,000		9.438.024,594	741.998,257	74,092	72,867	1,225							2,800	74,008	3,00%					3,780	73,979
MURO		-9,950	74,037	-3,00%				-4,050	74,214	3,00%	101+960,000		9.438.023,004	742.018,194	74,092	73,203	0,889							2,800	74,008	3,00%					3,715	73,981
MURO		-9,950	74,037	-3,00%				-4,050	74,214	3,00%	101+980,000		9.438.021,414	742.038,130	74,092	73,436	0,656							2,800	74,008	3,00%					3,643	73,983
MURO		-9,950	74,037	-3,00%				-4,050	74,214	3,00%	102+000,000		9.438.019,824	742.058,067	74,092	73,641	0,451							2,800	74,008	3,00%					2,834	74,007
MURO		-9,950	74,037	-3,00%				-4,050	74,214	3,00%	102+020,000		9.438.018,234	742.078,004	74,092	73,909	0,183							2,800	74,008	3,00%					4,909	77,172
MURO		-9,393	74,035	-3,00%				-3,745	74,204	3,00%	102+040,000		9.438.016,645	742.097,940	74,092	74,238	-0,146							2,800	74,008	3,00%					4,917	77,183
MURO		-7,604	74,043	-3,00%				-2,869	74,185	3,00%	102+060,000		9.438.015,055	742.117,877	74,099	74,433	-0,333							1,850	74,044	3,00%					1,925	74,156
MURO		-7,109	74,056	-3,00%				-2,671	74,189	3,00%	102+065,462	PC	9.438.014,621	742.123,322	74,109	74,490	-0,381							1,850	74,054	3,00%					1,876	74,093
MURO		-6,396	74,085	-3,00%				-2,407	74,204	3,00%	102+073,776		9.438.013,977	742.131,611	74,132	74,576	-0,444							1,850	74,077	3,00%					1,894	74,142
MURO		-6,042	74,106	-3,00%				-2,187	74,222	3,00%	102+080,000		9.438.013,518	742.137,818	74,156	74,654	-0,498							1,850	74,101	3,00%					2,010	74,341
MURO		-5,962	74,113	-3,00%				-2,111	74,229	3,00%	102+082,090	PT	9.438.013,368	742.139,903	74,165	74,685	-0,520							1,850	74,110	3,00%					2,033	74,384
MURO		-5,850	74,215	-3,00%				-2,000	74,330	3,00%	102+100,000		9.438.012,092	742.157,767	74,270	74,966	-0,695							1,850	74,215	3,00%					1,998	74,437
MURO		-5,850	74,338	-3,00%				-2,000	74,454	3,00%	102+115,296	PC	9.438.011,003	742.173,025	74,394	75,202	-0,808							1,850	74,338	3,00%					2,125	74,751
MURO		-5,850	74,378	-3,00%				-2,000	74,494	3,00%	102+120,000		9.438.010,661	742.177,716	74,434	75,252	-0,818							1,850	74,379	3,00%					2,243	74,967
MURO		-5,850	74,452	-3,00%				-2,000	74,567	3,00%	102+128,540		9.438.010,002	742.186,230	74,507	75,295	-0,788							1,850	74,452	3,00%					2,137	74,882
MURO		-5,850	74,549	-3,00%				-2,000	74,665	3,00%	102+140,000		9.438.009,042	742.197,650	74,605	75,358	-0,753							1,850	74,550	3,00%					2,093	74,914
MURO		-5,850	74,565	-3,00%				-2,000	74,680	3,00%	102+141,783	PT	9.438.008,884	742.199,426	74,620	75,366	-0,746							1,850	74,565	3,00%					2,163	75,035
MURO		-5,850	74,720	-3,00%				-2,000	74,836	3,00%	102+160,000		9.438.007,266	742.217,571	74,776	75,470	-0,694							1,850	74,721	3,00%					2,073	75,054
MURO		-5,850	74,891	-3,00%				-2,000	75,007	3,00%	102+180,000		9.438.005,490	742.237,492	74,947	75,608	-0,661							1,850	74,892	3,00%					2,141	75,327
-7,074	77,510	-5,850	75,062	-3,00%				-2,000	75,178	3,00%	102+200,000		9.438.003,714	742.257,413	75,118	75,795	-0,677							1,850	75,063	3,00%					2,018	75,398
-6,364	76,261	-5,850	75,233	-3,00%				-2,000	75,349	3,00%	102+220,000		9.438.001,938	742.277,334	75,289	75,719	-0,430							1,850	75,234	3,00%					2,084	75,701
-6,590	76,854	-5,850	75,374	-3,00%				-2,000	75,489	3,00%	102+240,000		9.438.000,162	742.297,255	75,429	75,661	-0,232							1,850	75,374	3,00%					1,865	75,404
-6,387	76,526	-5,850	75,452	-3,00%				-2,000	75,567	3,00%	102+260,000		9.437.998,386	742.317,176	75,507	75,666	-0,159							1,850	75,452	3,00%					1,852	75,456
-6,324	76,416	-5,850	75,468	-3,00%				-2,000	75,584	3,00%	102+280,000		9.437.996,610	742.337,097	75,524	75,683	-0,159							1,850	75,468	3,00%					2,752	75,441
-6,431	76,585	-5,850	75,423	-3,00%				-2,000	75,538	3,00%	102+300,000		9.437.994,834	742.357,018	75,478	75,684	-0,205							1,850	75,423	3,00%					2,658	75,399
-7,484	78,583	-5,850	75,316	-3,00%				-2,000	75,431	3,00%	102+320,000		9.437.993,058	742.376,939	75,371	75,678	-0,307							1,850	75,316	3,00%					1,944	75,503
-6,220	75,887	-5,850	75,146	-3,00%				-2,000	75,262	3,00%	102+340,000		9.437.991,282	742.396,860	75,202	75,371	-0,169							1,850	75,147	3,00%					1,879	75,205
-6,311	75,987	-5,850	75,064	-3,00%				-2,000	75,180	3,00%	102+348,228	PC	9.437.990,551	742.405,055	75,120	75,313	-0,193							1,850	75,064	3,00%					1,907	75,177
-6,448	76,143	-5,850	74,946	-3,00%				-2,000	75,062	3,00%	102+360,000		9.437.989,513	742.416,782	75,002	75,202	-0,200							1,850	74,947	3,00%					1,931	75,108
MURO		-5,850	74,773	-3,00%				-2,000	74,888	3,00%	102+377,376		9.437.988,005	742.434,092	74,828	75,045	-0,217							1,850	74,773	3,00%					1,870	74,803
MURO		-5,850	74,746	-3,00%				-2,000	74,862	3,00%	102+380,000		9.437.987,780	742.436,706	74,802	75,023	-0,221							2,800	74,718	3,00%					3,702	76,071
MURO		-5,850	74,546	-3,00%				-2,000	74,662	3,00%	102+400,000		9.437.986,087	742.456,635	74,602	74,954	-0,352							1,850	74,547	3,00%					2,022	74,804
MURO		-5,850	74,481	-3,00%				-2,000	74,597	3,00%	102+406,524	PT	9.437.985,544	742.463,136	74,537	74,937	-0,400							1,850	74,481	3,00%					2,288	75,137
MURO		-5,850	74,347	-3,00%				-2,000	74,462	3,00%	102+420,000		9.437.984,425	742.476,565	74,402	74,915	-0,513							1,850	74,347	3,00%					2,336	75,075
-6,012	74,470	-5,850	74,147	-3,00%				-2,000	74,262	3,00%	102+440,000		9.437.982,765	742.496,496	74,202	74,742	-0,540							1,850	74,147	3,00%					1,908	74,263
-6,047	74,340	-5,850	73,947	-3,00%				-2,000	74,062	3,00%	102+460,000		9.437.981,105	742.516,427	74,002	74,540	-0,538							1,850	73,947	3,00%					2,015	74,275
-5,918	73,882	-5,850	73,747	-3,00%				-2,000	73,862	3,00%	102+480,000		9.437.979,445	742.536,358	73,802	74,066	-0,264							1,850	73,747	3,00%					2,010	73,742
-5,925	73,544	-5,850	73,547	-3,00%				-2,000	73,662	3,00%	102+500,000		9.437.977,785	742.556,289	73,602	73,717	-0,115							1,850	73,547	3,00%					1,871	73,546
-5,907	73,345	-5,850	73,347	-3,00%				-2,000	73,462	3,00%	102+520,000		9.437.976,125	742.576,220	73,402	73,421	-0,019							1,850	73,347	3,00%					1,941	73,344
-6,277	73,134	-5,850	73,147	-3,00%				-2,000	73,262	3,00%	102+540,000		9.437.974,465	742.596,151	73,202	73,058	0,144							1,850	73,147	3,00%					2,151	73,137
-6,174	72,937	-5,850	72,947	-3,00%				-2,000	73,062	3,00%	102+560,000		9.437.972,805	742.616,082	73,002	72,869	0,133							1,850	72,947	3,00%					2,046	72,941
-6,319	72,870	-5,850	72,884	-3,00%				-2,000	73,000	3,00%	102+566,231	PC	9.437.972,288	742.622,292	72,940	72,713	0,226							1,850	72,884	3,00%					2,214	72,873
-6,256	72,734	-5,850	72,747	-3,00%				-2,000	72,862	3,00%	102+580,000		9.437.971,155	742.636,014	72,802	72,587	0,215							1,850	72,747	3,00%					2,256	72,734
-6,301	72,562	-5,850	72,576	-3,00%				-2,000	72,691	3,00%	102+597,089		9.437.969,775	742.653,047	72,631	72,436	0,195							1,850	72,576	3,00%					2,045	72,570
-6,498	72,527	-5,850	72,547	-3,00%				-2,000	72,662	3,00%	102+600,000		9.437.969,542	742.655,949	72,602	72,343	0,259							1,850	72,547	3,00%					1,980	72,543
-6,271	72,334	-5,850	72,347	-3,00%				-2,000	72,462	3,00%	102+620,000		9.437.967,970	742.675,887	72,402	72,235	0,167							1,850	72,347	3,00%					2,216	72,336
-6,596	72,246	-5,850	72,269	-3,00%				-2,000	72,384	3,00%	102+627,947	PT	9.437.967,356	742.683,810	72,324	72,154	0,170							1,850	72,269	3,00%					2,128	72,260
-6,466	72,138	-5,850	72,156	-3,00%				-2,000	72,272	3,00%	102+640,000		9.437.966,430	742.695,828	72,212	72,026	0,185							1,850	72,156	3,00%					1,921	72,154
-6,139	71,977	-5,850	71,985	-3,00%				-2,000	72,101	3,00%	102+660,000		9.437.964,893	742.715,769	72,041	71,994	0,047							1,850	71,985	3,00%					2,053	71,979
-6,504	73,142	-5,850	71,834	-3,00%				-2,000	71,950	3,00%	102+680,000		9.437.963,356	742.735,709	71,890	71,721	0,168							1,850	71,834	3,00%					2,331	71,820
-6,028	72,059	-5,850	71,702	-3,00%				-2,000	71,818	3,00%	102+700,000		9.437.961,819	742.755,650	71,758	71,778	-0,020							1,850	71,702	3,00%					1,983	71,699
-6,062	72,014	-5,850	71,590	-3,00%				-2,000	71,706	3,00%	102+720,000		9.437.960,282	742.775,591	71,646	71,716	-0,071							1,850	71,590	3,00%					2,147	71,581
-6,282	71,484	-5,850	71,497	-3,00%				-2,000	71,613	3,00%	102+740,000		9.437.958,745	742.795,532	71,553	71,599	-0,046							1,850	71,497	3,00%					1,906	71,496
-6,142	71,415	-5,850	71,424	-3,00%				-2,000	71,540	3,00%	102+760,000		9.437.957,208	742.815,473	71,480	71,240	0,240							1,850	71,424	3,00%					2,015	71,419
-6,040	71,750	-5,850	71,370	-3,00%				-2,000	71,486	3,00%	102+780,000		9.437.955,671	742.835,414	71,426	71,160	0,266							1,850	71,370	3,00%					1,989	71,366
-6,447	72,530	-5,850	71,336	-3,00%				-2,000	71,452	3,00%	102+800,000		9.437.954,134	742.855,355	71,392	71,191	0,201							1,850	71,336	3,00%					2,031	71,331
-6,832	73,285	-5,850	71,321	-3,00%				-2,000	71,437	3,00%	102+820,000		9.437.952,597	742.875,295	71,377	71,228	0,149							1,850	71,321	3,00%					2,054	71,315
-6,881	73,387	-5,850	71,326	-3,00%				-2,000	71,442	3,00%	102+840,000		9.437.951,060	742.895,236	71,382	71,270	0,111							1,850	71,326	3,00%					1,887	71,401
-8,466	76,581	-5,850	71,350	-3,00%				-2,000	71,466	3,00%	102+860,000		9.437.949,523	742.915,177	71,406	71,253	0,152							1,850	71,350	3,00%					1,943	71,348
-5,920	71,392	-5,850	71,394	-3,00%				-2,000	71,510	3,00%	102+880,000		9.437.947,986	742.935,118	71,450	71,446	0,003							1,850	71,394	3,00%					2,120	71,386
-5,898	71,554	-5,850	71,457	-3,00%				-2,000	71,573	3,00%	102+900,000		9.437.946,449	742.955,059	71,513	71,634	-0,121							1,850	71,457	3,00%					2,153	71,448
-5,862	71,505	-5,850	71,481	-3,00%				-2,000	71,597	3,00%	102+906,584	PC	9.437.945,943	742.961,624	71,537	71,678	-0,141							1,850	71,481	3,00%					2,558	71,460
-5,992	71,815	-5,850	71,530	-3,00%				-2,000	71,646	3,00%	102+920,000		9.437.944,757	742.974,987	71,586	71,661	-0,075							1,850	71,530	3,00%					2,814	71,501
-5,879	71,662	-5,850	71,603	-3,00%				-2,000	71,719	3,00%	102+940,000		9.437.942,417	742.994,848	71,659	71,663	-0,005							1,850	71,603	3,00%					2,454	71,585
-6,100	71,630	-5,850	71,637	-3,00%				-2,000	71,753	3,00%	102+949,340		9.437.941,090	743.004,093	71,693	71,677	0,015							1,850	71,637	3,00%					2,366	71,622
-5,918	71,674	-5,850	71,676	-3,00%				-2,000	71,792	3,00%	102+960,000		9.437.939,393	743.014,617	71,732	71,777	-0,045							1,850	71,676	3,00%					2,593	71,654
-5,863	71,774	-5,850	71,749	-3,00%				-2,000	71,865	3,00%	102+980,000		9.437.935,690	743.034,270	71,805	71,985	-0,180							1,850	71,749	3,00%					2,421	71,732
-5,987	71,789	-5,850	71,793	-3,00%				-2,000	71,909	3,00%	102+992,096	PT	9.437.933,122	743.046,091	71,849	72,026	-0,178							1,850	71,793	3,00%					2,471	71,775
-5,892	71,819	-5,850	71,820	-3,00%				-2,000	71,936	3,00%	102+999,448	PC	9.437.931,486	743.053,258	71,876	72,020	-0,144							1,850	71,820	3,00%					2,411	71,803
-5,977	71,818	-5,850	71,822	-3,00%				-2,000	71,938	3,00%	103+000,000		9.437.931,363	743.053,796	71,878	72,016	-0,138							1,850	71,822	3,00%					2,411	71,805
-6,275	72,745	-5,850	71,895	-3,00%				-2,000	72,011	3,00%	103+020,000		9.437.926,547	743.073,207	71,951	72,090	-0,140							1,850	71,895	3,00%					2,241	71,883
-6,060	72,389	-5,850	71,968	-3,00%				-2,000	72,083	3,00%	103+040,000		9.437.921,041	743.092,433	72,023	72,287	-0,264							1,850	71,968	3,00%					1,859	71,986
-6,276	72,892	-5,850	72,041	-3,00%				-2,000	72,156	3,00%	103+060,000		9.437.914,852	743.111,450	72,096	72,287	-0,190							1,850	72,041	3,00%					1,856	72,052
-6,944	74,282	-5,850	72,095	-3,00%				-2,000	72,210	3,00%	103+074,797		9.437.909,838	743.125,371	72,150	72,353	-0,202							1,850	72,095	3,00%					1,948	72,290

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-6,767	73,947	-5,850	72,114	-3,00%				-2,000	72,229	3,00%	103+080,000		9.437.907,988	743.130,234	72,169	72,442	-0,273							1,850	72,114	3,00%					1,916	72,245
-6,821	74,129	-5,850	72,187	-3,00%				-2,000	72,302	3,00%	103+100,000		9.437.900,458	743.148,761	72,242	72,603	-0,361							1,850	72,187	3,00%					1,993	72,472
-6,125	72,809	-5,850	72,260	-3,00%				-2,000	72,375	3,00%	103+120,000		9.437.892,270	743.167,007	72,315	72,751	-0,436							1,850	72,260	3,00%					2,079	72,717
-6,114	72,861	-5,850	72,333	-3,00%				-2,000	72,448	3,00%	103+140,000		9.437.883,437	743.184,950	72,388	72,811	-0,423							1,850	72,333	3,00%					2,136	72,904
-6,215	73,100	-5,850	72,370	-3,00%				-2,000	72,485	3,00%	103+150,147	PT	9.437.878,712	743.193,929	72,425	72,857	-0,431							1,850	72,370	3,00%					2,224	73,118
-6,071	72,832	-5,850	72,389	-3,00%				-2,000	72,504	3,00%	103+155,346	PC	9.437.876,249	743.198,508	72,444	72,907	-0,463							1,850	72,389	3,00%					2,258	73,205
-6,036	72,777	-5,850	72,406	-3,00%				-2,000	72,521	3,00%	103+160,000		9.437.874,029	743.202,598	72,461	72,980	-0,519							1,850	72,406	3,00%					2,267	73,240
-6,035	72,848	-5,850	72,479	-3,00%				-2,000	72,594	3,00%	103+180,000		9.437.864,142	743.219,983	72,534	73,062	-0,528							1,850	72,479	3,00%					2,676	74,130
-6,125	73,101	-5,850	72,552	-3,00%				-2,000	72,667	3,00%	103+200,000		9.437.853,700	743.237,039	72,607	73,094	-0,487							1,850	72,552	3,00%					3,019	74,889
-6,099	73,124	-5,850	72,625	-3,00%				-2,000	72,740	3,00%	103+220,000		9.437.842,713	743.253,750	72,680	73,292	-0,612							1,850	72,625	3,00%					2,699	74,322
-6,073	73,144	-5,850	72,698	-3,00%				-2,000	72,813	3,00%	103+240,000		9.437.831,193	743.270,098	72,753	73,301	-0,548							1,850	72,698	3,00%					2,503	74,004
-6,045	73,150	-5,850	72,759	-3,00%				-2,000	72,875	3,00%	103+260,000		9.437.819,151	743.286,065	72,815	73,301	-0,486							1,850	72,759	3,00%					2,360	73,780
-6,132	73,334	-5,850	72,770	-3,00%				-2,000	72,886	3,00%	103+264,368		9.437.816,453	743.289,500	72,826	73,300	-0,475							1,850	72,770	3,00%					2,406	73,883
-6,055	73,208	-5,850	72,799	-3,00%				-2,000	72,915	3,00%	103+280,000		9.437.806,601	743.301,636	72,855	73,318	-0,463							1,850	72,799	3,00%					2,232	73,564
-6,014	73,144	-5,850	72,817	-3,00%				-2,000	72,932	3,00%	103+300,000		9.437.793,555	743.316,794	72,872	73,401	-0,529							1,850	72,817	3,00%					2,401	73,918
-6,077	73,267	-5,850	72,812	-3,00%				-2,000	72,928	3,00%	103+320,000		9.437.780,027	743.331,524	72,868	73,474	-0,606							1,850	72,812	3,00%					2,249	73,609
-5,911	72,907	-5,850	72,785	-3,00%				-2,000	72,901	3,00%	103+340,000		9.437.766,031	743.345,809	72,841	73,407	-0,566							1,850	72,785	3,00%					2,159	73,403
-6,181	73,398	-5,850	72,737	-3,00%				-2,000	72,852	3,00%	103+360,000		9.437.751,581	743.359,636	72,792	73,424	-0,632							1,850	72,737	3,00%					2,305	73,647
-6,349	73,694	-5,850	72,696	-3,00%				-2,000	72,812	3,00%	103+373,389	PT	9.437.741,662	743.368,629	72,752	73,439	-0,687							1,850	72,696	3,00%					2,444	73,884
-6,449	73,875	-5,850	72,678	-3,00%				-2,000	72,794	3,00%	103+379,479	PC	9.437.737,107	743.372,670	72,734	73,433	-0,699							1,850	72,678	3,00%					2,697	74,373
-6,321	73,618	-5,850	72,676	-3,00%				-1,992	72,792	3,00%	103+380,000		9.437.736,717	743.373,016	72,732	73,445	-0,713							1,850	72,677	3,00%					2,695	74,366
-6,831	74,305	-5,986	72,615	-3,00%				-2,036	72,733	3,00%	103+400,000		9.437.721,480	743.385,970	72,672	73,566	-0,894							1,850	72,617	3,00%					2,470	73,857
MURO		-6,243	72,569	-3,00%				-2,196	72,690	3,00%	103+415,905		9.437.709,001	743.395,830	72,624	73,478	-0,854							1,850	72,569	3,00%					2,508	73,556
MURO		-6,331	72,554	-3,00%				-2,191	72,678	3,00%	103+420,000		9.437.705,738	743.398,304	72,612	73,471	-0,859							1,850	72,557	3,00%					2,470	73,486
MURO		-6,884	72,493	-3,00%				-2,453	72,626	3,00%	103+440,000		9.437.689,515	743.409,999	72,552	73,496	-0,944							1,850	72,497	3,00%					2,496	73,465
MURO		-7,330	72,460	-3,00%				-2,740	72,597	3,00%	103+452,331	PT	9.437.679,285	743.416,882	72,515	73,577	-1,062							1,850	72,460	3,00%					2,648	73,657
MURO		-7,638	72,436	-3,00%				-2,893	72,579	3,00%	103+460,000		9.437.672,870	743.421,085	72,492	73,575	-1,083							1,850	72,437	3,00%					2,665	73,659
MURO		-8,311	72,397	-3,00%				-3,227	72,549	3,00%	103+476,730	PC	9.437.658,875	743.430,252	72,452	73,564	-1,111							1,850	72,397	3,00%					2,666	73,620
MURO		-8,450	72,390	-3,00%				-3,271	72,545	3,00%	103+480,000		9.437.656,136	743.432,039	72,447	73,575	-1,128							1,850	72,392	3,00%					2,620	73,546
MURO		-8,834	72,378	-3,00%				-3,429	72,540	3,00%	103+487,815		9.437.649,564	743.436,266	72,438	73,595	-1,157							1,850	72,382	3,00%					2,620	73,538
MURO		-9,406	72,376	-3,00%				-3,772	72,545	3,00%	103+498,899	PT	9.437.640,175	743.442,157	72,432	73,591	-1,159							1,850	72,377	3,00%					2,608	73,513
MURO		-9,456	72,375	-3,00%				-3,785	72,546	3,00%	103+500,000		9.437.639,238	743.442,736	72,432	73,597	-1,165							1,850	72,377	3,00%					2,647	73,571
MURO		-9,945	72,375	-3,00%				-4,024	72,553	3,00%	103+520,000		9.437.622,228	743.453,256	72,432	73,710	-1,278							1,850	72,377	3,00%					2,586	73,481
MURO		-9,950	72,377	-3,00%				-4,050	72,553	3,00%	103+540,000		9.437.605,218	743.463,775	72,432	73,720	-1,288							1,850	72,377	3,00%					2,577	73,467
MURO		-9,950	72,377	-3,00%				-4,050	72,553	3,00%	103+560,000		9.437.588,208	743.474,295	72,432	73,719	-1,287							1,850	72,377	3,00%					2,614	73,522
MURO		-9,950	72,377	-3,00%				-4,050	72,553	3,00%	103+580,000		9.437.571,198	743.484,814	72,432	73,723	-1,291							1,850	72,377	3,00%					2,728	73,693
MURO		-9,950	72,377	-3,00%				-4,050	72,553	3,00%	103+600,000		9.437.554,188	743.495,334	72,432	73,719	-1,287							1,850	72,377	3,00%					2,908	73,963
MURO		-9,950	72,377	-3,00%				-4,050	72,553	3,00%	103+620,000		9.437.537,178	743.505,854	72,432	73,688	-1,256							1,850	72,377	3,00%					3,119	74,279
-11,391	75,264	-9,950	72,383	-3,00%				-4,050	72,560	3,00%	103+640,000		9.437.520,169	743.516,373	72,438	73,607	-1,169							1,850	72,383	3,00%					2,480	73,644
-11,322	75,139	-9,948	72,393	-3,00%				-4,050	72,570	3,00%	103+645,935	PC	9.437.515,120	743.519,495	72,448	73,606	-1,158							1,850	72,393	3,00%					2,447	73,586
-10,792	75,117	-9,459	72,451	-3,00%				-4,094	72,612	3,00%	103+660,000		9.437.503,122	743.526,832	72,489	73,606	-1,117							1,850	72,433	3,00%					2,376	73,485
-8,126	73,314	-7,736	72,534	-3,00%				-3,045	72,675	3,00%	103+680,000		9.437.485,933	743.537,058	72,584	73,590	-1,006							1,850	72,528	3,00%					2,350	73,528
-7,715	73,213	-7,386	72,555	-3,00%				-2,856	72,691	3,00%	103+684,221		9.437.482,288	743.539,184	72,605	73,590	-0,985							1,850	72,550	3,00%					2,357	73,564
-6,459	73,138	-6,206	72,633	-3,00%				-2,240	72,752	3,00%	103+700,000		9.437.468,601	743.547,037	72,685	73,600	-0,915							1,850	72,630	3,00%					2,310	73,550
-6,430	73,886	-5,852	72,731	-3,00%				-2,002	72,846	3,00%	103+720,000		9.437.451,128	743.556,767	72,786	73,594	-0,808							1,850	72,731	3,00%					2,231	73,492
-6,538	74,120	-5,850	72,743	-3,00%				-2,000	72,859	3,00%	103+722,506	PT	9.437.448,929	743.557,969	72,799	73,591	-0,792							1,850	72,743	3,00%					2,241	73,525
-7,248	75,629	-5,850	72,832	-3,00%				-2,000	72,947	3,00%	103+740,000		9.437.433,569	743.566,343	72,887	73,591	-0,704							1,850	72,832	3,00%					2,092	73,317
-7,580	76,394	-5,850	72,933	-3,00%				-2,000	73,049	3,00%	103+760,000		9.437.416,010	743.575,917	72,989	73,576	-0,587							1,850	72,933	3,00%					2,029	73,292
-7,511	76,271	-5,850	72,949	-3,00%				-2,000	73,065	3,00%	103+763,207	PC	9.437.413,194	743.577,452	73,005	73,576	-0,571							1,850	72,949	3,00%					2,020	73,290
-7,816	76,938	-5,850	73,006	-3,00%				-2,000	73,122	3,00%	103+774,256		9.437.403,552	743.582,847	73,062	73,574	-0,512							1,850	73,006	3,00%					1,991	73,289
-8,053	77,444	-5,850	73,039	-3,00%				-2,000	73,154	3,00%	103+780,000		9.437.398,587	743.585,735	73,094	73,577	-0,482							1,850	73,039	3,00%					1,977	73,293
-8,896	79,164	-5,850	73,072	-3,00%				-2,000	73,187	3,00%	103+785,305	PT	9.437.394,030	743.588,453	73,127	79,648	-6,521							1,850	73,072	3,00%					5,281	79,934
-9,398	80,266	-5,850	73,171	-3,00%				-2,000	73,286	3,00%	103+800,000		9.437.381,449	743.596,046	73,226	80,610	-7,384							1,850	73,171	3,00%					5,508	80,488
-9,273	80,153	-5,850	73,307	-3,00%				-2,000	73,423	3,00%	103+820,000		9.437.364,326	743.606,380	73,363	80,454	-7,091							1,850	73,307	3,00%					5,359	80,326
-6,181	74,105	-5,850	73,444	-3,00%				-2,000	73,559	3,00%	103+840,000		9.437.347,203	743.616,715	73,499	73,574	-0,074							1,850	73,444	3,00%					2,390	74,523
-6,081	74,041	-5,850	73,580	-3,00%				-2,000	73,696	3,00%	103+860,000		9.437.330,080	743.627,049	73,636	73,787	-0,151							1,850	73,580	3,00%					2,043	73,966
-5,861	73,716	-5,850	73,717	-3,00%				-2,000	73,832	3,00%	103+880,000		9.437.312,957	743.637,383	73,772	73,817	-0,045							1,850	73,717	3,00%					1,878	73,774
-6,005	73,856	-5,850	73,861	-3,00%				-2,000	73,976	3,00%	103+900,000		9.437.295,834	743.647,718	73,916	73,877	0,039							1,850	73,861	3,00%					2,542	75,244
-6,048	74,050	-5,850	74,056	-3,00%				-2,000	74,171	3,00%	103+920,000		9.437.278,711	743.658,052	74,111	74,129	-0,017							1,850	74,056	3,00%					2,448	75,252
-6,089	74,236	-5,850	74,243	-3,00%				-2,000	74,358	3,00%	103+935,302	PC	9.437.265,610	743.665,959	74,298	74,265	0,033							1,850	74,243	3,00%					2,532	75,607
-6,056	74,296	-5,850	74,303	-3,00%				-2,000	74,418	3,00%	103+940,000		9.437.261,598	743.668,403	74,358	74,299	0,059							1,850	74,303	3,00%					2,538	75,679
-6,174	74,547	-5,850	74,557	-3,00%				-2,000	74,672	3,00%	103+960,000		9.437.244,741	743.679,164	74,612	74,675	-0,063							1,850	74,557	3,00%					3,037	76,930
-5,865	74,834	-5,850	74,811	-3,00%				-2,000	74,926	3,00%	103+980,000		9.437.228,262	743.690,497	74,866	74,962	-0,096							1,850	74,811	3,00%					MURO	
-6,295	75,732	-5,850	75,065	-3,00%				-2,000	75,180	3,00%	104+000,000		9.437.212,182	743.702,387	75,120	75,297	-0,177							1,850	75,065	3,00%					MURO	
-6,056	75,600	-5,850	75,188	-3,00%				-2,000	75,303	3,00%	104+009,719		9.437.204,517	743.708,362	75,243	75,342	-0,098							1,850	75,188	3,00%					2,528	76,544
-5,994	75,607	-5,850	75,319	-3,00%				-2,000	75,434	3,00%	104+020,000		9.437.196,518	743.714,820	75,374	75,461	-0,087							1,850	75,319	3,00%					2,242	76,103
-5,925	75,723	-5,850	75,573	-3,00%				-2,000	75,688	3,00%	104+040,000		9.437.181,288	743.727,783	75,628	75,723	-0,095							1,850	75,573	3,00%					1,943	75,759
-5,938	76,001	-5,850	75,827	-3,00%				-2,000	75,942	3,00%	104+060,000		9.437.166,512	743.741,259	75,882	75,977	-0,095							1,850	75,827	3,00%					2,010	76,146
-5,956	76,291	-5,850	76,081	-3,00%				-2,000	76,196	3,00%	104+080,000		9.437.152,205	743.755,234	76,136	76,189	-0,053							1,850	76,081	3,00%					2,061	76,074
-5,951	76,336	-5,850	76,133	-3,00%				-2,000	76,249	3,00%	104+084,135	PT	9.437.149,308	743.758,184	76,189	76,241	-0,052							1,850	76,133	3,00%					2,125	76,125
-6,042	76,719	-5,850	76,335	-3,00%				-2,000	76,450	3,00%	104+100,000		9.437.138,230	743.769,541	76,390	76,533	-0,143							1,850	76,335	3,00%					2,236	76,323
-8,325	81,538	-5,850	76,589	-3,00%				-2,000	76,704	3,00%	104+120,000		9.437.124,266	743.783,858	76,644	76,872	-0,228							1,850	76,589	3,00%					2,230	76,577
-5,942	76,840	-5,850	76,843	-3,00%				-2,000	76,958	3,00%	104+140,000		9.437.110,301	743.798,176	76,898	77,086	-0,188							1,850	76,843	3,00%					1,865	76,872
-6,482	76,922	-5,855	76,940	-3,00%				-2,007	77,056	3,00%	104+147,694	PC	9.437.104,929	743.803,684	76,996	77,109	-0,114							1,850	76,940	3,00%					5,443	80,534
-6,656	77,078	-5,967	77,098	-3,00%				-2,090	77,215	3,00%	104+160,000		9.437.096,454	743.812,606	77,152	77,250	-0,098							1,850	77,097	3,00%					5,555	80,801
-7,190	77,328	-6,340	77,353	-3,00%				-2,291	77,475	3,00%	104+180,000		9.437.083,194	743.827,577	77,406	77,510	-0,104							1,850	77,351	3,00%					5,397	80,898
-7,377	77,593	-6,949	77,606	-3,00%				-2,572	77,737	3,00%	104+200,000		9.437.070,592	743.843,105	77,660	78,381	-0,721							1,850	77,605	3,00%					5,142	80,897
-7,722	77,719	-7,339	77,730	-3,00%				-2,741	77,868	3,00%	104+209,930		9.437.064,587	743.851,013	77,786	78,592	-0,806							1,850	77,731	3,00%					5,255	81,135
-8,492	78,556	-7,792	77,856	-3,00%				-2,933	78,002	3,00%	104+220,000		9.437.058,671	743.859,162	77,914	79,282	-1,368							1,850	77,859	3,00%					6,350	82,359
-11,971	81,205	-8,867	78,101	-3,00%				-3,374	78,266	3,00%	104+240,000		9.437.047,453	743.875,718	78,165	79,728	-1,563							1,850	78,109	3,00%					5,375	81,634
MURO		-9,793	78,282	-3,00%				-3,892	78,459	3,00%	104+260,000		9.437.036,958	743.892,741	78,343	80,058	-1,715							1,850	78,287	3,00%					3,947	80,384
MURO		-9,950	78,346	-3,00%				-4,050	78,523	3,00%	104+272,167	PT	9.437.030,936	743.903,313	78,401	79,703	-1,302							1,850	78,346	3,00%					3,852	80,348
MURO		-9,950	78,363	-3,00%				-4,050	78,540	3,00%	104+280,000		9.437.027,149	743.910,169	78,419	79,468	-1,049							1,850	78,363	3,00%					3,858	80,371
MURO		-9,950	78,367	-3,00%				-4,050	78,544	3,00%	104+300,000		9.437.017,479	743.927,676	78,422	79,682	-1,260							1,850	78,367	3,00%					4,283	80,800
MURO		-9,950	78,367	-3,00%				-4,050	78,544	3,00%	104+320,000		9.437.007,808	743.945,183	78,422	79,942	-1,520							1,850	78,367	3,00%					4,630	81,146
MURO		-9,950	78,367	-3,00%				-4,050	78,544	3,00%	104+340,000		9.436.998,138	743.962,690	78,422	80,330	-1,908							1,850	78,367	3,00%					4,742	81,259
MURO		-9,950	78,377	-3,00%				-4,050	78,554	3,00%	104+360,000		9.436.988,468	743.980,196	78,433	80,817	-2,384							1,850	78,377	3,00%					MURO	
MURO		-10,142	78,406	-3,00%				-4,116	78,586	3,00%	104+369,656	PC	9.436.983,799	743.988,648	78,463	81,464	-3,002							1,850	78,407	3,00%					MURO	
MURO		-10,513	78,462	-3,00%				-4,338	78,647	3,00%	104+380,000		9.436.979,012	743.997,817	78,517	81,427	-2,910							1,850	78,462	3,00%					MURO	
MURO		-11,070	78,634	-3,00%				-4,658	78,826	3,00%	104+400,000		9.436.971,002	744.016,136	78,687	80,871	-2,184							1,850	78,631	3,00%					MURO	
MURO		-11,222	78,718	-3,00%				-4,740	78,913	3,00%	104+407,377		9.436.968,473	744.023,065	78,770	80,712	-1,941							1,850	78,715	3,00%					MURO	
MURO		-11,414	78,878	-3,00%				-4,834	79,075	3,00%	104+420,000		9.436.964,689	744.035,106	78,930	80,596	-1,666							1,850	78,875	3,00%					MURO	
MURO		-11,544	79,137	-3,00%				-4,864	79,338	3,00%	104+440,000		9.436.960,124	744.054,571	79,192	80,349	-1,157							1,850	79,136	3,00%					MURO	
MURO		-11,543	79,205	-3,00%				-4,848	79,406	3,00%	104+445,098	PT	9.436.959,244	744.059,592	79,261	80,322	-1,062							1,850	79,205	3,00%					MURO	
MURO		-11,522	79,413	-3,00%				-4,836	79,614	3,00%	104+460,000		9.436.956,844	744.074,300	79,469	80,437	-0,968							1,850	79,413	3,00%					MURO	
MURO		-11,494	79,705	-3,00%				-4,822	79,906	3,00%	104+480,000		9.436.953,624	744.094,039	79,761	80,775	-1,014							1,850	79,706	3,00%					MURO	
MURO		-11,465	79,972	-3,00%				-4,808	80,171	3,00%	104+500,000		9.436.950,403	744.113,778	80,027	80,923	-0,896							1,850	79,972	3,00%					MURO	
											104+520,000		9.436.947,182	744.133,517	80,177	77,565	2,613															
											104+536,197	PC	9.436.944,573	744.149,502	80,211	76,857	3,354															
											104+540,000		9.436.943,974	744.153,258	80,211	78,072	2,139															
-15,497	78,296	-12,865	80,051	-3,00%				-4,509	80,301	3,00%	104+560,000		9.436.941,259	744.173,071	80,166	80,840	-0,674							3,850	80,051	3,00%					5,449	78,985
-14,426	78,273	-11,960	79,917	-3,00%				-4,075	80,153	3,00%	104+580,000		9.436.939,279	744.192,972	80,031	80,621	-0,590							3,850	79,916	3,00%					6,784	77,960

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-15,265	77,061	-11,206	79,766	-3,00%				-3,677	79,992	3,00%	104+596,553		9.436.938,199	744.209,489	79,882	80,519	-0,637							3,850	79,767	3,00%					4,439	79,374
-15,362	76,861	-11,049	79,737	-3,00%				-3,623	79,960	3,00%	104+600,000		9.436.938,038	744.212,932	79,851	80,437	-0,586							3,850	79,736	3,00%					4,191	79,508
-14,903	76,375	-10,132	79,556	-3,00%				-3,153	79,766	3,00%	104+620,000		9.436.937,536	744.232,925	79,671	80,383	-0,712							3,850	79,556	3,00%					3,860	79,565
-14,430	75,897	-9,211	79,376	-3,00%				-2,691	79,572	3,00%	104+640,000		9.436.937,776	744.252,922	79,491	80,222	-0,731							3,850	79,376	3,00%					5,114	78,533
-13,652	75,739	-8,431	79,220	-3,00%				-2,290	79,404	3,00%	104+656,909	PT	9.436.938,556	744.269,813	79,335	80,060	-0,725							3,850	79,220	3,00%					5,301	78,252
-13,637	75,629	-8,296	79,190	-3,00%				-2,251	79,371	3,00%	104+660,000		9.436.938,746	744.272,898	79,304	80,030	-0,726							3,850	79,188	3,00%					5,515	78,078
-13,659	75,079	-7,853	78,949	-3,00%				-2,021	79,124	3,00%	104+680,000		9.436.939,981	744.292,860	79,064	79,709	-0,645							3,850	78,948	3,00%					5,969	77,536
-13,483	74,900	-7,850	78,656	-3,00%				-2,000	78,831	3,00%	104+700,000		9.436.941,217	744.312,821	78,771	79,350	-0,579							3,850	78,656	3,00%					6,099	77,156
-13,394	74,660	-7,850	78,356	-3,00%				-2,000	78,531	3,00%	104+720,000		9.436.942,452	744.332,783	78,471	78,983	-0,512							3,850	78,356	3,00%					6,621	76,508
											104+740,000		9.436.943,687	744.352,745	78,171	74,238	3,933															
											104+760,000		9.436.944,922	744.372,707	77,871	77,815	0,056															
-13,929	73,403	-7,850	77,456	-3,00%				-2,000	77,631	3,00%	104+780,000		9.436.946,157	744.392,669	77,571	78,051	-0,480							3,850	77,456	3,00%					3,994	77,600
-12,597	73,991	-7,850	77,156	-3,00%				-2,000	77,331	3,00%	104+800,000		9.436.947,392	744.412,631	77,271	77,890	-0,619							3,850	77,156	3,00%					3,973	77,279
-11,764	74,266	-7,850	76,876	-3,00%				-2,000	77,051	3,00%	104+820,000		9.436.948,627	744.432,592	76,991	77,671	-0,680							3,850	76,876	3,00%					4,000	77,025
-10,981	74,548	-7,850	76,636	-3,00%				-2,000	76,811	3,00%	104+840,000		9.436.949,862	744.452,554	76,751	77,245	-0,494							3,850	76,636	3,00%					4,037	76,823
-9,935	75,045	-7,850	76,436	-3,00%				-2,000	76,611	3,00%	104+860,000		9.436.951,097	744.472,516	76,551	77,014	-0,463							3,850	76,436	3,00%					4,096	76,681
-9,105	75,517	-7,850	76,353	-3,00%				-2,000	76,528	3,00%	104+869,174	PC	9.436.951,664	744.481,673	76,468	76,922	-0,454							3,850	76,353	3,00%					4,209	76,712
-8,725	75,672	-7,850	76,256	-3,00%				-2,000	76,431	3,00%	104+880,000		9.436.952,226	744.492,484	76,371	76,726	-0,355							3,850	76,256	3,00%					4,380	76,785
-7,936	76,018	-7,850	76,076	-3,00%				-2,000	76,251	3,00%	104+900,000		9.436.952,704	744.512,477	76,191	76,498	-0,307							3,850	76,076	3,00%					4,247	76,472
-8,348	76,393	-7,850	75,896	-3,00%				-2,000	76,071	3,00%	104+920,000		9.436.952,456	744.532,474	76,011	76,196	-0,185							3,850	75,896	3,00%					3,978	76,023
-9,134	77,000	-7,850	75,716	-3,00%				-2,000	75,891	3,00%	104+940,000		9.436.951,480	744.552,449	75,831	76,130	-0,299							3,850	75,716	3,00%					4,061	75,927
-10,090	77,775	-7,850	75,536	-3,00%				-2,000	75,711	3,00%	104+960,000		9.436.949,779	744.572,376	75,651	76,018	-0,367							3,850	75,536	3,00%					5,067	76,752
-9,932	77,437	-7,850	75,356	-3,00%				-2,000	75,531	3,00%	104+980,000		9.436.947,355	744.592,227	75,471	75,201	0,270							3,850	75,356	3,00%					4,025	75,530
-9,863	77,188	-7,850	75,176	-3,00%				-2,000	75,351	3,00%	105+000,000		9.436.944,210	744.611,977	75,291	75,194	0,097							3,850	75,176	3,00%					3,877	75,203
-10,372	77,517	-7,850	74,996	-3,00%				-2,000	75,171	3,00%	105+020,000		9.436.940,350	744.631,600	75,111	75,175	-0,064							3,850	74,996	3,00%					3,877	74,977
-10,006	76,972	-7,850	74,816	-3,00%				-2,000	74,991	3,00%	105+040,000		9.436.935,778	744.651,069	74,931	74,756	0,175							3,850	74,816	3,00%					4,720	75,685
-9,319	76,126	-7,850	74,657	-3,00%				-2,000	74,832	3,00%	105+057,612		9.436.931,169	744.668,067	74,772	74,597	0,175							3,850	74,657	3,00%					4,091	74,898
-9,205	75,991	-7,850	74,636	-3,00%				-2,000	74,811	3,00%	105+060,000		9.436.930,502	744.670,360	74,751	74,586	0,165							3,850	74,636	3,00%					4,212	74,998
-8,308	74,914	-7,850	74,456	-3,00%				-2,000	74,631	3,00%	105+080,000		9.436.924,528	744.689,446	74,571	74,899	-0,328							3,850	74,456	3,00%					5,363	75,969
-8,243	74,669	-7,850	74,276	-3,00%				-2,000	74,451	3,00%	105+100,000		9.436.917,864	744.708,302	74,391	74,842	-0,451							3,850	74,276	3,00%					4,690	75,115
-8,050	74,295	-7,850	74,096	-3,00%				-2,000	74,271	3,00%	105+120,000		9.436.910,519	744.726,903	74,211	74,432	-0,221							3,850	74,096	3,00%					4,275	74,521
-8,355	73,579	-7,850	73,916	-3,00%				-2,000	74,091	3,00%	105+140,000		9.436.902,503	744.745,225	74,031	74,186	-0,155							3,850	73,916	3,00%					4,114	74,180
-12,099	70,903	-7,850	73,736	-3,00%				-2,000	73,911	3,00%	105+160,000		9.436.893,826	744.763,243	73,851	73,845	0,006							3,850	73,736	3,00%					3,965	73,659
-11,881	70,869	-7,850	73,556	-3,00%				-2,000	73,731	3,00%	105+180,000		9.436.884,499	744.780,934	73,671	73,513	0,158							3,850	73,556	3,00%					4,425	73,172
-11,873	70,694	-7,850	73,376	-3,00%				-2,000	73,551	3,00%	105+200,000		9.436.874,536	744.798,275	73,491	73,409	0,082							3,850	73,376	3,00%					4,322	73,061
-11,841	70,535	-7,850	73,196	-3,00%				-2,000	73,371	3,00%	105+220,000		9.436.863,948	744.815,241	73,311	73,231	0,080							3,850	73,196	3,00%					4,603	72,694
-10,872	71,001	-7,850	73,016	-3,00%				-2,000	73,191	3,00%	105+240,000		9.436.852,751	744.831,811	73,131	72,996	0,135							3,850	73,016	3,00%					4,563	72,540
-10,537	71,170	-7,850	72,961	-3,00%				-2,000	73,137	3,00%	105+246,050	PT	9.436.849,246	744.836,742	73,077	72,975	0,102							3,850	72,961	3,00%					4,514	72,519
-9,679	71,616	-7,850	72,836	-3,00%				-2,000	73,011	3,00%	105+260,000		9.436.841,102	744.848,068	72,951	72,934	0,017							3,850	72,836	3,00%					4,312	72,528
-9,078	71,844	-7,850	72,663	-3,00%				-2,000	72,838	3,00%	105+280,000		9.436.829,425	744.864,306	72,778	72,930	-0,152							3,850	72,663	3,00%					3,861	72,655
-8,782	71,882	-7,850	72,504	-3,00%				-2,000	72,679	3,00%	105+300,000		9.436.817,749	744.880,543	72,619	72,847	-0,228							3,850	72,504	3,00%					3,938	72,591
-8,492	71,931	-7,850	72,359	-3,00%				-2,000	72,534	3,00%	105+320,000		9.436.806,072	744.896,781	72,474	72,713	-0,239							3,850	72,359	3,00%					3,863	72,372
-8,330	71,908	-7,850	72,228	-3,00%				-2,000	72,403	3,00%	105+340,000		9.436.794,395	744.913,019	72,343	72,522	-0,179							3,850	72,228	3,00%					3,948	72,162
-8,120	71,924	-7,850	72,104	-3,00%				-2,000	72,279	3,00%	105+360,000		9.436.782,719	744.929,256	72,219	72,498	-0,279							3,850	72,104	3,00%					3,948	72,202
-8,198	71,747	-7,850	71,980	-3,00%				-2,000	72,155	3,00%	105+380,000		9.436.771,042	744.945,494	72,095	72,466	-0,371							3,850	71,980	3,00%					4,128	72,258
-7,998	71,757	-7,850	71,856	-3,00%				-2,000	72,031	3,00%	105+400,000		9.436.759,366	744.961,731	71,971	72,642	-0,671							3,850	71,856	3,00%					4,429	72,435
-8,063	71,590	-7,850	71,732	-3,00%				-2,000	71,907	3,00%	105+420,000		9.436.747,689	744.977,969	71,847	72,393	-0,546							3,850	71,732	3,00%					4,384	72,266
-8,154	71,406	-7,850	71,608	-3,00%				-2,000	71,783	3,00%	105+440,000		9.436.736,013	744.994,206	71,723	72,339	-0,616							3,850	71,608	3,00%					4,437	72,195
-7,995	71,504	-7,973	71,483	-3,00%				-2,053	71,661	3,00%	105+460,000		9.436.724,336	745.010,444	71,599	72,274	-0,674							3,850	71,484	3,00%					4,456	72,090
-8,032	71,501	-8,006	71,475	-3,00%				-2,075	71,653	3,00%	105+461,403	PC	9.436.723,517	745.011,583	71,591	72,273	-0,682							3,850	71,475	3,00%					4,465	72,090
-8,485	71,403	-8,447	71,365	-3,00%				-2,376	71,547	3,00%	105+480,000		9.436.712,941	745.026,878	71,475	72,092	-0,617							3,850	71,360	3,00%					4,350	71,860
-9,163	71,065	-8,893	71,245	-3,00%				-2,673	71,432	3,00%	105+500,000		9.436.702,204	745.043,751	71,352	71,799	-0,447							3,850	71,236	3,00%					3,974	71,360
-9,278	71,015	-8,961	71,226	-3,00%				-2,718	71,413	3,00%	105+503,160		9.436.700,570	745.046,455	71,332	71,752	-0,420							3,850	71,216	3,00%					3,885	71,251
-9,807	70,793	-9,310	71,125	-3,00%				-2,942	71,316	3,00%	105+520,000		9.436.692,146	745.061,036	71,228	71,689	-0,462							3,850	71,112	3,00%					4,011	71,273
											105+540,000		9.436.682,781	745.078,707	71,104	71,626	-0,523															
											105+544,918	PT	9.436.680,587	745.083,107	71,073	71,060	0,013															
											105+560,000		9.436.673,922	745.096,637	70,980	65,718	5,262															
											105+573,599	PC	9.436.667,912	745.108,836	70,895	65,726	5,169															
											105+580,000		9.436.665,144	745.114,608	70,856	69,184	1,671															
											105+584,766		9.436.663,162	745.118,942	70,826	71,347	-0,521															
											105+595,934	PT	9.436.658,786	745.129,216	70,760	71,548	-0,787															
-9,136	70,186	-8,393	70,681	-3,00%				-3,243	70,836	3,00%	105+600,000		9.436.657,262	745.132,986	70,738	71,553	-0,815							3,150	70,644	3,00%					3,535	71,029
-12,353	67,580	-7,867	70,570	-3,00%				-2,716	70,725	3,00%	105+620,000		9.436.649,765	745.151,527	70,643	71,393	-0,750							3,150	70,549	3,00%					3,596	70,995
-15,018	65,484	-7,498	70,497	-3,00%				-2,348	70,652	3,00%	105+633,983	PC	9.436.644,523	745.164,490	70,581	69,305	1,276							3,150	70,487	3,00%					3,689	71,026
-15,569	64,992	-7,357	70,466	-3,00%				-2,207	70,621	3,00%	105+640,000		9.436.642,250	745.170,062	70,555	70,892	-0,337							3,150	70,460	3,00%					3,959	71,270
-15,678	64,804	-7,237	70,431	-3,00%				-2,087	70,586	3,00%	105+647,150		9.436.639,506	745.176,665	70,523	71,304	-0,781							3,150	70,429	3,00%					3,688	70,966
-17,196	63,675	-7,150	70,372	-3,00%				-2,000	70,526	3,00%	105+660,000		9.436.634,457	745.188,481	70,466	71,272	-0,806							3,150	70,372	3,00%					3,721	70,942
-17,210	63,663	-7,150	70,370	-3,00%				-2,000	70,525	3,00%	105+660,318	PT	9.436.634,330	745.188,773	70,465	71,271	-0,806							3,150	70,370	3,00%					3,721	70,941
-17,360	63,476	-7,150	70,283	-3,00%				-2,000	70,438	3,00%	105+680,000		9.436.626,474	745.206,818	70,378	71,177	-0,800							3,150	70,283	3,00%					3,849	70,982
-10,343	68,066	-7,150	70,195	-3,00%				-2,000	70,349	3,00%	105+700,000		9.436.618,491	745.225,156	70,289	71,079	-0,790							3,150	70,195	3,00%					3,787	70,831
-10,591	68,063	-7,524	70,107	-3,00%				-2,211	70,267	3,00%	105+720,000		9.436.610,508	745.243,494	70,201	71,143	-0,943							3,150	70,106	3,00%					3,910	70,866
-18,971	63,580	-9,289	70,034	-3,00%				-3,070	70,221	3,00%	105+740,000		9.436.602,525	745.261,831	70,129	71,176	-1,048							3,150	70,034	3,00%					4,112	70,996
-20,752	63,504	-10,984	70,017	-3,00%				-3,906	70,229	3,00%	105+760,000		9.436.594,541	745.280,169	70,112	71,200	-1,088							3,150	70,018	3,00%					4,078	70,945
-20,700	63,718	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+780,000		9.436.586,558	745.298,507	70,112	71,209	-1,097							3,150	70,018	3,00%					4,008	70,876
-15,546	67,154	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+800,000		9.436.578,575	745.316,844	70,112	71,254	-1,142							3,150	70,018	3,00%					3,979	70,846
-15,161	67,410	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+820,000		9.436.570,592	745.335,182	70,112	71,197	-1,085							3,150	70,018	3,00%					4,259	71,127
-16,461	66,544	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+840,000		9.436.562,609	745.353,520	70,112	71,317	-1,205							3,150	70,018	3,00%					4,373	71,240
-16,521	66,504	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+860,000		9.436.554,626	745.371,857	70,112	70,995	-0,883							3,150	70,018	3,00%					3,933	70,800
-16,193	66,722	-11,250	70,018	-3,00%				-4,050	70,234	3,00%	105+880,000		9.436.546,643	745.390,195	70,112	70,951	-0,839							3,150	70,018	3,00%					3,155	70,022
-15,879	66,918	-11,234	70,014	-3,00%				-4,029	70,230	3,00%	105+891,928	PC	9.436.541,882	745.401,131	70,109	70,966	-0,857							3,150	70,015	3,00%					3,250	70,115
-15,759	66,837	-10,999	70,010	-3,00%				-3,915	70,223	3,00%	105+898,895		9.436.539,129	745.407,531	70,105	70,800	-0,695							3,150	70,011	3,00%					3,730	69,624
-15,713	66,824	-10,934	70,009	-3,00%				-3,880	70,221	3,00%	105+900,000		9.436.538,697	745.408,549	70,105	70,724	-0,620							3,150	70,010	3,00%					3,873	69,528
-15,568	66,605	-10,468	70,005	-3,00%				-3,659	70,209	3,00%	105+905,862	PT	9.436.536,431	745.413,955	70,099	70,489	-0,390							3,150	70,005	3,00%					4,389	69,179
-15,371	65,846	-9,158	69,988	-3,00%				-3,004	70,172	3,00%	105+920,000		9.436.531,015	745.427,014	70,082	70,361	-0,279							3,150	69,988	3,00%					5,734	68,265
-15,910	64,377	-7,549	69,951	-3,00%				-2,215	70,111	3,00%	105+940,000		9.436.523,352	745.445,488	70,045	69,951	0,094							3,150	69,950	3,00%					7,225	67,233
-16,424	63,825	-7,281	69,920	-3,00%				-2,065	70,077	3,00%	105+952,072	PC	9.436.518,727	745.456,640	70,015	69,781	0,234							3,150	69,920	3,00%					8,575	66,303
-13,428	65,735	-7,184	69,897	-3,00%				-2,017	70,052	3,00%	105+960,000		9.436.515,660	745.463,950	69,992	69,083	0,909							3,150	69,898	3,00%					9,779	65,478
-13,379	65,766	-7,183	69,897	-3,00%				-2,016	70,052	3,00%	105+960,158		9.436.515,599	745.464,096	69,992	69,065	0,927							3,150	69,897	3,00%					9,660	65,557
-15,345	64,409	-7,150	69,873	-3,00%				-2,000	70,027	3,00%	105+968,244	PT	9.436.512,411	745.471,526	69,967	67,579	2,388							3,150	69,873	3,00%					9,868	65,394
-14,111	65,197	-7,150	69,838	-3,00%				-2,000	69,992	3,00%	105+980,000		9.436.507,731	745.482,311	69,932	67,907	2,025							3,150	69,838	3,00%					5,899	68,005
-10,605	67,474	-7,150	69,778	-3,00%				-2,000	69,932	3,00%	106+000,000		9.436.499,771	745.500,659	69,872	69,978	-0,106							3,150	69,778	3,00%					4,815	68,667
-8,822	68,603	-7,150	69,718	-3,00%				-2,000	69,872	3,00%	106+020,000		9.436.491,811	745.519,006	69,812	70,073	-0,261							3,150	69,718	3,00%					4,384	68,895
-11,171	66,977	-7,150	69,658	-3,00%				-2,000	69,812	3,00%	106+040,000		9.436.483,851	745.537,354	69,752	69,701	0,051							3,150	69,658	3,00%					5,230	68,271
-8,079	68,978	-7,150	69,598	-3,00%				-2,000	69,752	3,00%	106+060,000		9.436.475,890	745.555,702	69,692	69,921	-0,229							3,150	69,598	3,00%					3,779	69,179
-7,548	69,272	-7,150	69,538	-3,00%				-2,000	69,692	3,00%	106+080,000		9.436.467,930	745.574,049	69,632	69,974	-0,342							3,150	69,538	3,00%					3,386	69,773
-7,160	69,471	-7,150	69,478	-3,00%				-2,000	69,632	3,00%	106+100,000		9.436.459,970	745.592,397	69,572	70,002	-0,430							3,150	69,478	3,00%					3,498	69,826
-7,904	68,930	-7,150	69,433	-3,00%				-2,000	69,587	3,00%	106+120,000		9.436.452,010	745.610,744	69,527	69,805	-0,278							3,150	69,433	3,00%					3,306	69,588
-7,339	69,291	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+138,968	PC	9.436.444,460	745.628,145	69,512	69,859	-0,347							3,150	69,418	3,00%					3,363	69,631
-7,543	69,156	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+140,000		9.436.444,049	745.629,092	69,512	69,848	-0,336							3,150	69,418	3,00%					3,256	69,523
-7,375	69,642	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+147,688		9.436.440,946	745.636,126	69,512	69,864	-0,352							3,150	69,418	3,00%					3,234	69,502
-7,513	69,780	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+156,408	PT	9.436.437,345	745.644,067	69,512	69,867	-0,355							3,150	69,418	3,00%					3,288	69,326
-7,649	69,917	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+160,000		9.436.435,844	745.647,331	69,512	69,870	-0,358							3,150	69,418	3,00%					3,735	69,027

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO															
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-7,226	69,493	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+180,000		9.436.427,485	745.665,500	69,512	69,585	-0,073							3,150	69,418	3,00%					3,159	69,412
-7,344	69,288	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+189,268	PC	9.436.423,612	745.673,920	69,512	69,510	0,002							3,150	69,418	3,00%					3,382	69,263
-7,161	69,428	-7,150	69,418	-3,00%				-2,000	69,572	3,00%	106+200,000		9.436.419,214	745.683,709	69,512	69,559	-0,047							3,150	69,418	3,00%					3,222	69,490
-7,981	69,527	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+220,000		9.436.411,484	745.702,154	69,512	70,056	-0,544							3,850	69,397	3,00%					4,029	69,576
-7,982	69,528	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+240,000		9.436.404,370	745.720,845	69,512	69,965	-0,453							3,850	69,397	3,00%					4,174	69,721
-8,210	69,756	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+260,000		9.436.397,878	745.739,761	69,512	69,871	-0,359							3,850	69,397	3,00%					4,000	69,297
-8,048	69,594	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+276,008		9.436.393,135	745.755,051	69,512	69,880	-0,368							3,850	69,397	3,00%					4,631	68,876
-8,257	69,804	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+280,000		9.436.392,016	745.758,882	69,512	69,847	-0,335							3,850	69,397	3,00%					4,704	68,827
-8,049	69,264	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+300,000		9.436.386,790	745.778,186	69,512	69,756	-0,244							3,850	69,397	3,00%					4,431	69,009
-8,477	68,979	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+320,000		9.436.382,206	745.797,653	69,512	69,737	-0,225							3,850	69,397	3,00%					4,544	68,934
-8,897	68,699	-7,850	69,397	-3,00%				-2,000	69,572	3,00%	106+340,000		9.436.378,269	745.817,261	69,512	69,742	-0,230							3,850	69,397	3,00%					4,670	68,850
-9,633	68,218	-7,850	69,407	-3,00%				-2,000	69,582	3,00%	106+360,000		9.436.374,984	745.836,988	69,522	69,706	-0,184							3,850	69,407	3,00%					4,053	69,610
-9,727	68,162	-7,850	69,413	-3,00%				-2,000	69,589	3,00%	106+362,749	PT	9.436.374,583	745.839,708	69,529	69,668	-0,139							3,850	69,413	3,00%					5,818	68,101
-10,143	67,917	-7,909	69,406	-4,89%				-2,000	69,695	3,00%	106+380,000		9.436.372,109	745.856,780	69,635	69,653	-0,018							3,850	69,519	3,00%					6,159	67,980
-11,376	67,419	-8,448	69,370	-7,60%				-2,000	69,860	3,00%	106+400,000		9.436.369,240	745.876,573	69,800	69,628	0,172							3,850	69,684	3,00%					6,258	68,079
-13,642	66,642	-9,616	69,319	-3,00%	-5,756	69,435	-18,53%	-2,159	70,102	3,00%	106+420,000		9.436.366,371	745.896,367	70,037	69,245	0,792							3,850	69,922	3,00%					8,149	67,055
-16,759	65,724	-11,419	69,265	-3,00%	-7,548	69,382	-21,02%	-2,848	70,370	3,00%	106+440,000		9.436.363,503	745.916,160	70,285	68,190	2,094							3,850	70,169	3,00%					9,840	66,176
-18,435	65,313	-12,503	69,240	-3,00%	-8,623	69,356	-21,81%	-3,359	70,504	3,00%	106+449,628	PC	9.436.362,122	745.925,688	70,404	66,441	3,962							3,850	70,288	3,00%					10,445	65,891
-19,829	65,136	-13,679	69,213	-3,00%	-9,805	69,329	-18,26%	-3,850	70,417	-3,00%	106+460,000		9.436.360,767	745.935,971	70,532	67,517	3,015							3,850	70,417	3,00%					11,644	65,221
-7,100	68,498	-3,850	70,664	-3,00%							106+480,000		9.436.358,910	745.955,883	70,780	63,932	6,847							3,850	70,664	3,00%					15,329	63,011
-6,266	69,238	-3,850	70,848	-3,00%							106+494,894		9.436.358,175	745.970,758	70,964	67,733	3,231							3,850	70,848	3,00%					16,061	62,708
-6,117	69,400	-3,850	70,912	-3,00%							106+500,000		9.436.358,051	745.975,862	71,027	69,263	1,764							3,850	70,912	3,00%					8,967	67,500
-6,252	69,527	-3,850	71,128	-3,00%							106+520,000		9.436.358,191	745.995,860	71,244	68,378	2,865							3,850	71,128	3,00%					16,834	62,472
											106+540,000		9.436.359,330	746.015,825	71,368	66,213	5,156															
											106+540,160	PT	9.436.359,343	746.015,984	71,369	66,151	5,219															
											106+560,000		9.436.360,976	746.035,757	71,461	59,659	11,802															
											106+580,000		9.436.362,622	746.055,689	71,492	56,019	15,473															
											106+600,000		9.436.364,269	746.075,621	71,492	54,000	17,492															
											106+620,000		9.436.365,915	746.095,554	71,492	54,000	17,492															
											106+640,000		9.436.367,561	746.115,486	71,492	54,000	17,492															
											106+660,000		9.436.369,207	746.135,418	71,492	54,000	17,492															
											106+680,000		9.436.370,853	746.155,350	71,492	54,000	17,492															
											106+700,000		9.436.372,499	746.175,282	71,492	54,000	17,492															
											106+720,000		9.436.374,146	746.195,214	71,492	54,000	17,492															
											106+740,000		9.436.375,792	746.215,146	71,492	62,893	8,599															
											106+760,000		9.436.377,438	746.235,079	71,492	63,342	8,150															
-9,730	67,487	-3,850	71,407	-3,00%							106+780,000		9.436.379,084	746.255,011	71,522	63,142	8,380							3,850	71,407	3,00%	15,850	63,407	19,850	63,607	26,742	59,012
-9,746	67,476	-3,850	71,407	-3,00%							106+800,000		9.436.380,730	746.274,943	71,522	62,950	8,572							3,850	71,407	3,00%	15,850	63,407	19,850	63,607	23,769	60,994
-9,559	67,601	-3,850	71,407	-3,00%							106+820,000		9.436.382,376	746.294,875	71,522	62,756	8,766							3,850	71,407	3,00%	15,850	63,407	19,850	63,607	22,500	61,840
-9,351	67,739	-3,850	71,407	-3,00%							106+840,000		9.436.384,023	746.314,807	71,522	62,818	8,704							3,850	71,407	3,00%	15,850	63,407	19,850	63,607	21,860	62,266
-9,881	67,386	-3,850	71,407	-3,00%							106+860,000		9.436.385,669	746.334,739	71,522	62,482	9,040							3,850	71,407	3,00%	15,850	63,407	19,850	63,607	21,889	62,247
											106+880,000		9.436.387,315	746.354,671	71,492	62,780	8,712															
											106+900,000		9.436.388,961	746.374,604	71,492	62,462	9,030															
											106+920,000		9.436.390,607	746.394,536	71,492	62,945	8,547															
											106+940,000		9.436.392,253	746.414,468	71,492	62,595	8,897															
-9,263	67,786	-3,850	71,395	-3,00%							106+960,000		9.436.393,900	746.434,400	71,510	62,183	9,328							3,850	71,395	3,00%	15,850	63,395	19,850	63,595	25,566	59,784
-9,268	67,739	-3,850	71,352	-3,00%							106+971,681	PC	9.436.394,861	746.446,042	71,467	62,331	9,136							3,850	71,352	3,00%	15,850	63,352	19,850	63,552	25,503	59,783
-9,193	67,739	-3,850	71,302	-3,00%							106+980,000		9.436.395,589	746.454,328	71,417	62,332	9,085							3,850	71,302	3,00%	15,850	63,302	19,850	63,502	26,056	59,364
-9,899	67,111	-3,850	71,144	-3,00%							106+997,478		9.436.397,398	746.471,712	71,259	60,719	10,540							3,850	71,144	3,00%	15,850	63,144	19,850	63,344	25,595	59,513
-9,836	67,124	-3,850	71,115	-3,00%							107+000,000		9.436.397,691	746.474,217	71,230	60,766	10,465							3,850	71,115	3,00%	15,850	63,115	19,850	63,315	25,625	59,465
-9,145	67,316	-3,850	70,847	-3,00%							107+020,000		9.436.400,289	746.494,047	70,962	61,501	9,461							3,850	70,847	3,00%	15,850	62,847	19,850	63,047	26,578	58,561
-9,033	67,346	-3,850	70,801	-3,00%							107+023,275	PT	9.436.400,762	746.497,288	70,916	61,641	9,275							3,850	70,801	3,00%	15,850	62,801	19,850	63,001	26,633	58,479
-8,415	67,523	-3,850	70,567	-3,00%							107+040,000		9.436.403,210	746.513,833	70,682	62,125	8,557							3,850	70,567	3,00%	15,850	62,567	19,850	62,767	26,776	58,149
-7,738	67,694	-3,850	70,287	-3,00%							107+060,000		9.436.406,137	746.533,617	70,402	62,295	8,107							3,850	70,287	3,00%	15,850	62,287	19,850	62,487	26,189	58,261
-6,873	67,991	-3,850	70,007	-3,00%							107+080,000		9.436.409,065	746.553,402	70,122	63,412	6,710							3,850	70,007	3,00%	15,850	62,007	19,850	62,207	25,495	58,443
-6,125	68,210	-3,850	69,727	-3,00%							107+100,000		9.436.411,992	746.573,186	69,842	64,647	5,195							3,850	69,727	3,00%	15,850	61,727	19,850	61,927	25,275	58,310
MURO		-10,968	69,416	-3,00%				-3,552	69,639	3,00%	107+120,000		9.436.414,919	746.592,971	69,532	65,471	4,061							3,850	69,417	3,00%	15,850	61,417	19,850	61,617	24,960	58,210
MURO		-9,676	69,136	-3,00%				-2,907	69,339	3,00%	107+140,000		9.436.417,847	746.612,756	69,252	66,530	2,722							3,850	69,137	3,00%	15,850	61,137	19,850	61,337	24,557	58,199
MURO		-9,525	69,103	-3,00%				-2,832	69,304	3,00%	107+142,345	PC	9.436.418,190	746.615,075	69,219	66,647	2,572							3,850	69,104	3,00%	15,850	61,104	19,850	61,304	24,506	58,200
MURO		-8,574	68,854	-3,00%				-2,315	69,041	3,00%	107+160,000		9.436.420,581	746.632,567	68,972	66,926	2,046							3,850	68,857	3,00%	15,850	60,857	19,850	61,057	24,093	58,228
MURO		-8,268	68,742	-3,00%				-2,207	68,924	3,00%	107+168,142		9.436.421,554	746.640,651	68,858	67,189	1,669							3,850	68,743	3,00%	15,850	60,743	19,850	60,943	23,678	58,390
MURO		-7,972	68,573	-3,00%				-2,009	68,752	3,00%	107+180,000		9.436.422,823	746.652,441	68,692	67,492	1,200							3,850	68,577	3,00%	15,850	60,577	19,850	60,777	23,341	58,449
MURO		-7,850	68,381	-3,00%				-2,000	68,557	3,00%	107+193,938	PT	9.436.424,091	746.666,321	68,497	67,541	0,955							3,850	68,381	3,00%	15,850	60,381	19,850	60,581	23,216	58,338
MURO		-7,850	68,297	-3,00%				-2,000	68,472	3,00%	107+200,000		9.436.424,590	746.672,362	68,412	67,549	0,863							3,850	68,297	3,00%	15,850	60,297	19,850	60,497	23,254	58,228
-20,637	59,492	-7,850	68,017	-3,00%				-2,000	68,192	3,00%	107+220,000		9.436.426,236	746.692,294	68,132	67,860	0,272							3,850	68,017	3,00%					18,259	58,410
-19,978	59,660	-7,850	67,745	-3,00%				-2,000	67,921	3,00%	107+240,000		9.436.427,882	746.712,227	67,861	67,925	-0,064							3,850	67,745	3,00%					18,109	58,239
-19,683	59,648	-7,850	67,537	3,00%				-2,000	67,712	3,00%	107+260,000		9.436.429,528	746.732,159	67,652	67,805	-0,153							3,850	67,537	3,00%					17,575	58,387
-19,215	59,823	-7,850	67,400	-3,00%				-2,000	67,575	3,00%	107+280,000		9.436.431,175	746.752,091	67,515	67,702	-0,187							3,850	67,400	3,00%					16,767	58,788
-19,031	59,871	-7,850	67,325	-3,00%				-2,000	67,501	3,00%	107+300,000		9.436.432,821	746.772,023	67,441	67,866	-0,425							3,850	67,325	3,00%					16,059	59,186
-18,537	60,135	-7,850	67,260	-3,00%				-2,000	67,435	3,00%	107+320,000		9.436.434,467	746.791,955	67,375	67,793	-0,417							3,850	67,260	3,00%					15,009	59,820
-17,909	60,499	-7,850	67,205	-3,00%				-2,000	67,380	3,00%	107+340,000		9.436.436,113	746.811,887	67,320	67,910	-0,590							3,850	67,205	3,00%					14,186	60,314
-17,365	60,862	-7,850	67,205	-3,00%				-2,000	67,380	3,00%	107+351,326	PC	9.436.437,045	746.823,175	67,320	67,962	-0,641							3,850	67,205	3,00%					14,125	60,355
-17,131	61,028	-7,850	67,215	-3,00%				-2,000	67,390	3,00%	107+356,871		9.436.437,500	746.828,701	67,330	67,935	-0,605							3,850	67,215	3,00%					14,131	60,361
-17,133	61,035	-7,850	67,223	-3,00%				-2,000	67,399	3,00%	107+360,000		9.436.437,756	746.831,820	67,339	67,955	-0,616							3,850	67,223	3,00%					14,134	60,368
-16,928	61,180	-7,850	67,231	-3,00%				-2,000	67,407	3,00%	107+362,416	PT	9.436.437,952	746.834,228	67,347	67,940	-0,593							3,850	67,231	3,00%					14,135	60,375
-16,665	61,450	-7,850	67,327	-3,00%				-2,000	67,502	3,00%	107+380,000		9.436.439,380	746.851,754	67,442	67,812	-0,369							3,850	67,327	3,00%					14,164	60,451
-16,595	61,674	-7,850	67,504	-3,00%				-2,000	67,680	3,00%	107+400,000		9.436.441,004	746.871,688	67,620	67,806	-0,186							3,850	67,504	3,00%					14,257	60,566
-16,603	61,679	-7,850	67,515	-3,00%				-2,000	67,690	3,00%	107+401,128	PC	9.436.441,096	746.872,812	67,630	67,788	-0,158							3,850	67,515	3,00%					14,270	60,568
-16,484	61,828	-7,850	67,584	-3,00%				-2,000	67,759	3,00%	107+408,487		9.436.441,696	746.880,147	67,699	67,743	-0,044							3,850	67,584	3,00%					14,332	60,596
-16,350	61,986	-7,850	67,653	-3,00%				-2,000	67,828	3,00%	107+415,847	PT	9.436.442,302	746.887,481	67,768	67,992	-0,224							3,850	67,653	3,00%					14,377	60,635
-16,453	61,957	-7,850	67,692	-3,00%				-2,000	67,867	3,00%	107+420,000		9.436.442,645	746.891,620	67,807	68,197	-0,389							3,850	67,692	3,00%					6,063	66,216
-16,383	62,191	-7,850	67,880	-3,00%				-2,000	68,055	3,00%	107+440,000		9.436.444,298	746.911,552	67,995	68,469	-0,474							3,850	67,880	3,00%					4,048	68,078
-16,124	62,551	-7,850	68,067	-3,00%				-2,000	68,243	3,00%	107+460,000		9.436.445,952	746.931,483	68,183	68,341	-0,158							3,850	68,067	3,00%					4,314	67,758
-15,916	62,878	-7,850	68,255	-3,00%				-2,000	68,431	3,00%	107+480,000		9.436.447,605	746.951,415	68,371	68,460	-0,089							3,850	68,255	3,00%					4,648	67,723
-15,938	63,051	-7,850	68,443	-3,00%				-2,000	68,619	3,00%	107+500,000		9.436.449,259	746.971,346	68,559	68,560	-0,002							3,850	68,443	3,00%					5,105	67,607
-16,060	63,158	-7,850	68,631	-3,00%				-2,000	68,806	3,00%	107+520,000		9.436.450,912	746.991,278	68,746	68,508	0,239							3,850	68,631	3,00%					10,337	64,306
-16,355	63,149	-7,850	68,819	-3,00%				-2,000	68,994	3,00%	107+540,000		9.436.452,565	747.011,209	68,934	68,389	0,545							3,943	68,816	3,00%					13,389	62,519
-16,477	63,255	-7,850	69,006	-3,00%				-2,000	69,182	3,00%	107+560,000		9.436.454,219	747.031,141	69,122	68,358	0,763							5,372	68,961	3,00%					16,947	61,244
-16,039	63,735	-7,850	69,194	-3,00%				-2,000	69,370	3,00%	107+580,000		9.436.455,872	747.051,072	69,310	68,513	0,797	2,000	69,250	3,00%	2,951	69,278	-3,00%	6,801	69,163	3,00%					18,635	61,273
-16,223	63,800	-7,850	69,382	-3,00%				-2,000	69,557	3,00%	107+600,000		9.436.457,525	747.071,004	69,497	68,542	0,955	2,000	69,437	3,00%	3,992	69,497	-3,00%	7,842	69,382	3,00%					18,718	62,131
-16,505	63,800	-7,850	69,570	-3,00%				-2,000	69,745	3,00%	107+620,000		9.436.459,179	747.090,935	69,685	68,537	1,148	2,000	69,625	3,00%	4,000	69,685	-3,00%	7,850	69,570	3,00%					18,574	62,420
-16,786	63,800	-7,850	69,758	-3,00%				-2,000	69,933	3,00%	107+640,000		9.436.460,832	747.110,867	69,873	68,474	1,399							3,850	69,758	3,00%					EIXO LINHA 4	
-16,613	64,104	-7,850	69,945	-3,00%				-2,000	70,121	3,00%	107+660,000		9.436.462,486	747.130,799	70,061	68,430	1,631							3,850	69,945	3,00%					EIXO LINHA 4	
-16,886	64,109	-7,850	70,133	-3,00%				-2,000	70,309	3,00%	107+680,000		9.436.464,139	747.150,730	70,249	68,737	1,511							3,850	70,133	3,00%					EIXO LINHA 4	
-16,870	64,307	-7,850	70,321	-3,00%				-2,000	70,496	3,00%	107+700,000		9.436.465,792	747.170,662	70,436	68,620	1,817							3,850	70,321	3,00%					6,865	68,407
-16,780	64,555	-7,850	70,509	-3,00%				-2,000	70,684	3,00%	107+720,000		9.436.467,446	747.190,593	70,624	68,646	1,978							3,850	70,509	3,00%					8,548	67,377
-16,783	64,568	-7,850	70,523	-3,00%				-2,000	70,698	3,00%	107+721,462	PC	9.436.467,567	747.192,050	70,638	68,658	1,981							3,850	70,523	3,00%					8,694	67,294
-16,782	64,622	-7,850	70,576	-3,00%				-2,000	70,752	3,00%	107+726,834		9.436.468,010	747.197,404	70,692	68,718	1,973							3,850	70,576	3,00%					8,828	67,257
-16,785	64,677	-7,850	70,634	-3,00%				-2,000	70,809	3,00%	107+732,205	PT	9.436.468,452	747.202,757	70,749	68,869	1,881							3,850	70,634	3,00%					8,768	67,355
-16,807	64,753	-7,850	70,725	-3,00%				-2,000	70,900	3,00%	107+740,000		9.436.469,092	747.210,525	70,840	69,073	1,767							3,850	70,725	3,00%					8,668	67,513
-16,575	65,180	-7,850	70,997	-3,00%				-2,000	71,172	3,00%	107+760,000		9.436.470,735	747.230,458	71,112	69,222	1,890							3,850	70,997	3,00%					9,145	67,466
-16,567	65,485	-7,850	71,297	-3,00%				-2,000	71,472	3,00%	107+780,000		9.436.472,378	747.250,390	71,412	69,310	2,102							3,850	71,297	3,00%					9,748	67,365

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-16,586	65,769	-7,850	71,593	-3,00%				-2,000	71,769	3,00%	107+800,000		9.436.474,020	747.270,323	71,709	69,563	2,146							3,850	71,593	3,00%					10,133	67,404
-16,400	66,132	-7,850	71,833	-3,00%				-2,000	72,008	3,00%	107+817,436	PC	9.436.475,452	747.287,700	71,948	69,943	2,005							3,850	71,833	3,00%					10,372	67,485
-16,336	66,216	-7,861	71,866	-3,00%				-2,000	72,042	3,00%	107+820,000		9.436.475,652	747.290,256	71,982	70,020	1,962							3,850	71,866	3,00%					10,395	67,503
-16,510	66,377	-8,103	71,982	-3,00%				-2,013	72,164	3,00%	107+829,677		9.436.476,209	747.299,916	72,104	70,163	1,941							3,850	71,989	3,00%					10,644	67,459
-17,195	66,452	-8,712	72,107	-3,00%				-2,290	72,300	3,00%	107+840,000		9.436.476,459	747.310,236	72,231	70,232	1,999							3,850	72,116	3,00%					11,719	66,870
-17,344	66,479	-8,865	72,131	-3,00%				-2,381	72,326	3,00%	107+841,917	PT	9.436.476,466	747.312,153	72,255	70,238	2,017							3,850	72,139	3,00%					12,131	66,619
-18,861	66,686	-10,344	72,364	-3,00%				-3,289	72,576	3,00%	107+860,000		9.436.476,477	747.330,236	72,477	70,225	2,252							3,850	72,362	3,00%					15,859	64,355
-19,504	66,778	-10,975	72,463	-3,00%				-3,677	72,682	3,00%	107+867,721	PC	9.436.476,482	747.337,957	72,572	70,209	2,363							3,850	72,456	3,00%					14,531	65,336
-20,191	66,950	-11,707	72,606	-3,00%				-4,037	72,836	3,00%	107+879,962		9.436.476,739	747.350,194	72,715	70,224	2,491							3,850	72,599	3,00%					14,010	65,826
-20,192	66,950	-11,708	72,606	-3,00%				-4,037	72,836	3,00%	107+880,000		9.436.476,741	747.350,232	72,715	70,224	2,491							3,850	72,600	3,00%					14,010	65,827
-20,384	67,097	-11,950	72,720	-3,00%				-4,050	72,957	3,00%	107+892,202	PT	9.436.477,495	747.362,410	72,835	70,322	2,514							3,850	72,720	3,00%					13,887	66,029
-20,357	67,180	-11,950	72,784	-3,00%				-4,050	73,021	3,00%	107+900,000		9.436.478,136	747.370,182	72,900	70,427	2,473							3,850	72,784	3,00%					13,785	66,161
-20,125	67,457	-11,950	72,907	-3,00%				-4,050	73,144	3,00%	107+920,000		9.436.479,779	747.390,114	73,023	70,711	2,312							3,850	72,907	3,00%					14,875	65,558
-19,794	67,740	-11,950	72,969	-3,00%				-4,050	73,206	3,00%	107+940,000		9.436.481,421	747.410,047	73,084	71,033	2,051							3,850	72,969	3,00%					13,322	66,654
-19,372	68,029	-11,950	72,977	-3,00%				-4,050	73,214	3,00%	107+960,000		9.436.483,064	747.429,979	73,092	71,055	2,037							3,850	72,977	3,00%					14,137	66,119
-19,048	68,245	-11,950	72,977	-3,00%				-4,050	73,214	3,00%	107+980,000		9.436.484,707	747.449,911	73,092	71,173	1,919							3,850	72,977	3,00%					13,615	66,467
-18,662	68,537	-11,950	73,012	-3,00%				-4,050	73,249	3,00%	108+000,000		9.436.486,349	747.469,844	73,127	71,451	1,676							3,850	73,012	3,00%					13,150	66,812
-18,609	68,669	-11,950	73,108	-3,00%				-4,050	73,345	3,00%	108+018,718	PC	9.436.487,887	747.488,498	73,223	71,814	1,409							3,850	73,108	3,00%					12,079	67,622
-18,611	68,676	-11,949	73,117	-3,00%				-4,058	73,354	3,00%	108+020,000		9.436.487,993	747.489,776	73,232	71,856	1,376							3,850	73,117	3,00%					12,111	67,609
-17,810	69,198	-11,670	73,292	-3,00%				-3,914	73,524	3,00%	108+040,000		9.436.489,917	747.509,683	73,407	72,252	1,155							3,850	73,292	3,00%					13,122	67,110
-17,798	69,200	-11,648	73,300	-3,00%				-3,898	73,532	3,00%	108+040,795		9.436.490,003	747.510,474	73,415	72,270	1,146							3,850	73,300	3,00%					13,035	67,177
-17,211	69,326	-10,895	73,537	-3,00%				-3,536	73,758	3,00%	108+060,000		9.436.492,337	747.529,535	73,652	72,895	0,757							3,850	73,537	3,00%					6,801	71,569
-17,085	69,348	-10,742	73,576	-3,00%				-3,442	73,795	3,00%	108+062,873	PT	9.436.492,726	747.532,382	73,692	72,978	0,714							3,850	73,577	3,00%					6,793	71,615
-16,371	69,433	-9,796	73,816	-3,00%				-2,969	74,021	3,00%	108+080,000		9.436.495,072	747.549,348	73,932	73,314	0,618							3,850	73,817	3,00%					6,774	71,867
-15,900	69,450	-9,076	73,999	-3,00%				-2,609	74,193	3,00%	108+093,028	PC	9.436.496,857	747.562,252	74,114	73,609	0,505							3,850	73,999	3,00%					6,148	72,467
-15,472	69,593	-8,719	74,094	-3,00%				-2,399	74,284	3,00%	108+100,000		9.436.497,782	747.569,163	74,212	73,818	0,394							3,850	74,097	3,00%					5,899	72,731
-14,635	69,989	-8,156	74,308	-3,00%				-2,152	74,488	3,00%	108+115,105		9.436.499,579	747.584,161	74,423	74,196	0,228							3,850	74,308	3,00%					5,622	73,127
-14,423	70,117	-8,036	74,375	-3,00%				-2,066	74,554	3,00%	108+120,000		9.436.500,100	747.589,028	74,492	74,292	0,200							3,850	74,377	3,00%					5,566	73,233
-14,023	70,506	-7,850	74,621	-3,00%				-2,000	74,796	3,00%	108+137,183	PT	9.436.501,695	747.606,136	74,736	74,545	0,191							3,850	74,621	3,00%					5,597	73,456
-14,018	70,550	-7,850	74,662	-3,00%				-2,000	74,837	3,00%	108+140,000		9.436.501,927	747.608,944	74,777	74,564	0,213							3,850	74,662	3,00%					5,629	73,476
-14,175	70,740	-7,850	74,957	-3,00%				-2,000	75,132	3,00%	108+160,000		9.436.503,570	747.628,876	75,072	74,803	0,269							3,850	74,957	3,00%					5,762	73,682
-13,514	71,481	-7,850	75,257	-3,00%				-2,000	75,432	3,00%	108+180,000		9.436.505,212	747.648,809	75,372	75,139	0,233							3,850	75,257	3,00%					5,945	73,860
-12,708	72,318	-7,850	75,557	-3,00%				-2,000	75,732	3,00%	108+200,000		9.436.506,855	747.668,741	75,672	75,579	0,093							3,850	75,557	3,00%					5,478	74,471
-11,941	73,129	-7,850	75,857	-3,00%				-2,000	76,032	3,00%	108+220,000		9.436.508,498	747.688,673	75,972	75,964	0,008							3,850	75,857	3,00%					5,269	74,911
-11,308	73,852	-7,850	76,157	-3,00%				-2,000	76,332	3,00%	108+240,000		9.436.510,140	747.708,606	76,272	76,332	-0,060							3,850	76,157	3,00%					5,113	75,315
-10,516	74,679	-7,850	76,457	-3,00%				-2,000	76,632	3,00%	108+260,000		9.436.511,783	747.728,538	76,572	76,893	-0,321							3,850	76,457	3,00%					3,917	76,523
-9,702	75,522	-7,850	76,757	-3,00%				-2,000	76,932	3,00%	108+280,000		9.436.513,426	747.748,471	76,872	77,077	-0,205							3,850	76,757	3,00%					4,078	76,984
-9,451	75,989	-7,850	77,057	-3,00%				-2,000	77,232	3,00%	108+300,000		9.436.515,068	747.768,403	77,172	77,817	-0,645	3,850	77,057	3,00%	6,932	77,407	-11,36%	10,831	77,286	3,10%					11,218	77,031
-8,750	76,756	-7,850	77,357	-3,00%				-2,000	77,532	3,00%	108+320,000		9.436.516,711	747.788,335	77,472	78,058	-0,586	3,850	77,357	3,00%	4,661	77,625	-33,05%	8,525	77,506	3,08%					8,864	77,280
-8,174	77,441	-7,850	77,657	-3,00%				-2,000	77,832	3,00%	108+340,000		9.436.518,354	747.808,268	77,772	78,493	-0,721	2,000	77,712	3,00%	4,000	77,772	-3,00%	7,850	77,656	3,00%					7,925	77,731
-8,160	77,750	-7,850	77,957	-3,00%				-2,000	78,132	3,00%	108+360,000		9.436.519,996	747.828,200	78,072	78,795	-0,723	2,000	78,012	3,00%	4,000	78,072	-3,00%	7,850	77,956	3,00%					8,018	78,124
-7,925	78,332	-7,850	77,957	-3,00%				-2,000	78,432	3,00%	108+380,000		9.436.521,639	747.848,133	78,372	79,080	-0,708	2,000	78,312	3,00%	4,000	78,372	-3,00%	7,850	78,256	3,00%					8,091	78,498
-7,948	78,654	-7,850	78,557	-3,00%				-2,000	78,732	3,00%	108+400,000		9.436.523,282	747.868,065	78,672	79,347	-0,675	2,000	78,612	3,00%	4,000	78,672	-3,00%	7,850	78,556	3,00%					8,225	78,932
-8,216	79,222	-7,850	78,857	-3,00%				-2,000	79,032	3,00%	108+420,000		9.436.524,924	747.887,998	78,972	79,662	-0,690	2,000	78,912	3,00%	4,000	78,972	-3,00%	7,850	78,856	3,00%					8,319	79,325
-8,489	79,795	-7,850	79,157	-3,00%				-2,000	79,332	3,00%	108+440,000		9.436.526,567	747.907,930	79,272	79,952	-0,680	2,000	79,212	3,00%	4,000	79,272	-3,00%	7,850	79,156	3,00%					8,476	79,783
-9,074	80,680	-7,850	79,457	-3,00%				-2,000	79,632	3,00%	108+460,000		9.436.528,210	747.927,862	79,572	80,221	-0,649	2,000	79,512	3,00%	4,000	79,572	-3,00%	7,850	79,457	3,00%					8,857	80,464
-9,845	81,751	-7,850	79,757	-3,00%				-2,000	79,932	3,00%	108+480,000		9.436.529,853	747.947,795	79,872	80,574	-0,702	2,000	79,812	3,00%	4,000	79,872	-3,00%	7,850	79,757	3,00%					8,958	80,865
-10,434	82,640	-7,850	80,057	-3,00%				-2,000	80,232	3,00%	108+500,000		9.436.531,495	747.967,727	80,172	80,729	-0,557	2,000	80,112	3,00%	4,000	80,172	-3,00%	7,850	80,057	3,00%					9,608	81,815
-10,290	82,797	-7,850	80,357	-3,00%				-2,000	80,532	3,00%	108+520,000		9.436.533,138	747.987,660	80,472	81,069	-0,597	2,000	80,412	3,00%	3,986	80,472	-3,00%	7,836	80,356	3,00%					9,403	81,923
-9,982	82,789	-7,850	80,657	-3,00%				-2,000	80,832	3,00%	108+540,000		9.436.534,781	748.007,592	80,772	81,360	-0,588	2,000	80,712	3,00%	3,436	80,755	-3,00%	7,286	80,640	3,00%					8,808	82,162
-9,851	82,957	-7,850	80,957	-3,00%				-2,000	81,132	3,00%	108+560,000		9.436.536,423	748.027,525	81,072	81,657	-0,585	2,000	81,012	3,00%	2,149	81,016	-3,00%	5,999	80,901	3,00%					6,890	81,792
-10,452	83,858	-7,850	81,257	-3,00%				-2,000	81,432	3,00%	108+580,000		9.436.538,066	748.047,457	81,372	81,982	-0,610							4,570	81,235	3,00%					5,451	82,116
-6,399	82,694	-5,850	81,597	-3,00%				-2,000	81,712	3,00%	108+600,000		9.436.539,709	748.067,389	81,652	82,222	-0,570							1,850	81,597	3,00%					2,429	82,474
-6,395	82,759	-5,850	81,669	-3,00%				-2,000	81,784	3,00%	108+605,699	PC	9.436.540,177	748.073,069	81,724	82,226	-0,502							1,850	81,669	3,00%					2,361	82,444
-6,363	82,755	-5,850	81,730	-3,00%				-2,000	81,845	3,00%	108+610,693		9.436.540,602	748.078,045	81,785	82,167	-0,381							1,850	81,730	3,00%					2,302	82,414
-6,345	82,778	-5,850	81,788	-3,00%				-2,000	81,904	3,00%	108+615,687	PT	9.436.541,059	748.083,018	81,844	82,192	-0,348							1,850	81,788	3,00%					2,260	82,409
-6,363	82,862	-5,850	81,837	-3,00%				-2,000	81,952	3,00%	108+620,000		9.436.541,466	748.087,312	81,892	82,151	-0,259							1,850	81,837	3,00%					2,241	82,429
MURO		-5,850	82,057	-3,00%				-2,000	82,172	3,00%	108+640,000		9.436.543,357	748.107,222	82,112	82,632	-0,520							1,850	82,057	3,00%					MURO	
MURO		-5,850	82,180	-3,00%				-2,000	82,296	3,00%	108+651,259	PC	9.436.544,421	748.118,431	82,236	82,863	-0,628							1,850	82,180	3,00%					MURO	
MURO		-5,850	82,260	-3,00%				-2,000	82,376	3,00%	108+658,528		9.436.545,236	748.125,653	82,316	82,898	-0,582							1,850	82,260	3,00%					MURO	
MURO		-5,850	82,277	-3,00%				-2,000	82,392	3,00%	108+660,000		9.436.545,433	748.127,112	82,332	82,929	-0,597							1,850	82,277	3,00%					MURO	
-6,956	83,999	-5,850	82,340	-3,00%				-2,000	82,456	3,00%	108+665,796	PT	9.436.546,309	748.132,842	82,396	83,014	-0,618							1,850	82,340	3,00%					MURO	
-7,137	84,426	-5,850	82,497	-3,00%				-2,000	82,612	3,00%	108+680,000		9.436.548,655	748.146,851	82,552	83,179	-0,627							1,850	82,497	3,00%					MURO	
-8,591	84,804	-7,850	82,557	-3,00%				-2,000	82,733	3,00%	108+690,993	PC	9.436.550,470	748.157,692	82,673	83,443	-0,770							1,850	82,617	3,00%					2,008	83,095
-8,560	84,799	-7,850	82,649	-3,00%				-2,000	82,825	3,00%	108+699,327		9.436.551,675	748.165,939	82,765	83,541	-0,777							1,850	82,709	3,00%					2,004	83,177
-8,556	84,795	-7,850	82,656	-3,00%				-2,000	82,832	3,00%	108+700,000		9.436.551,757	748.166,606	82,772	83,549	-0,777							1,850	82,717	3,00%					2,003	83,179
-8,529	84,800	-7,850	82,744	-3,00%				-2,000	82,919	3,00%	108+707,662	PT	9.436.552,535	748.174,228	82,859	83,605	-0,746							1,850	82,804	3,00%					2,002	83,264
-8,478	84,800	-7,850	82,896	-3,00%				-2,000	83,071	3,00%	108+720,000		9.436.553,553	748.186,524	83,011	83,780	-0,769							1,850	82,956	3,00%					2,019	83,468
-8,387	84,800	-7,850	83,174	-3,00%				-2,000	83,350	3,00%	108+740,000		9.436.555,202	748.206,456	83,290	84,097	-0,807							1,850	83,234	3,00%					2,039	83,807
-8,288	84,800	-7,850	83,472	-3,00%				-2,000	83,647	3,00%	108+760,000		9.436.556,852	748.226,388	83,587	84,384	-0,797							1,850	83,532	3,00%					2,030	84,078
-8,190	84,800	-7,850	83,769	-3,00%				-2,000	83,945	3,00%	108+780,000		9.436.558,501	748.246,320	83,885	84,575	-0,690							1,850	83,829	3,00%					1,991	84,256
-8,092	84,799	-7,850	84,067	-3,00%				-2,000	84,242	3,00%	108+800,000		9.436.560,151	748.266,252	84,182	84,826	-0,644							1,850	84,127	3,00%					1,970	84,489
-8,010	84,849	-7,850	84,364	-3,00%				-2,000	84,540	3,00%	108+820,000		9.436.561,800	748.286,184	84,480	85,123	-0,643							1,850	84,424	3,00%					1,989	84,846
-8,028	85,202	-7,850	84,662	-3,00%				-2,000	84,837	3,00%	108+840,000		9.436.563,450	748.306,116	84,777	85,418	-0,641							1,850	84,722	3,00%					1,989	85,143
-7,967	85,315	-7,850	84,959	-3,00%				-2,000	85,135	3,00%	108+860,000		9.436.565,099	748.326,047	85,075	85,651	-0,577							1,850	85,019	3,00%					1,989	85,442
-7,982	85,168	-7,850	85,257	-3,00%				-2,000	85,432	3,00%	108+880,000		9.436.566,749	748.345,979	85,372	85,874	-0,502							1,850	85,317	3,00%					1,958	85,643
-7,969	85,917	-7,850	85,554	-3,00%				-2,000	85,730	3,00%	108+900,000		9.436.568,398	748.365,911	85,670	86,357	-0,688							1,850	85,614	3,00%					1,922	85,832
-7,882	85,948	-7,850	85,852	-3,00%				-2,000	86,027	3,00%	108+920,000		9.436.570,048	748.385,843	85,967	86,572	-0,605							1,850	85,912	3,00%					1,937	86,177
-7,862	86,141	-7,850	86,149	-3,00%				-2,000	86,325	3,00%	108+940,000		9.436.571,697	748.405,775	86,265	86,853	-0,589							1,850	86,209	3,00%					2,020	86,726
-7,896	86,586	-7,850	86,447	-3,00%				-2,000	86,622	3,00%	108+960,000		9.436.573,347	748.425,707	86,562	87,209	-0,646							1,850	86,507	3,00%					2,041	87,085
-7,899	86,893	-7,850	86,744	-3,00%				-2,000	86,920	3,00%	108+980,000		9.436.574,996	748.445,639	86,860	87,553	-0,693							1,850	86,805	3,00%					2,056	87,430
-7,960	86,969	-7,850	87,042	-3,00%				-2,000	87,218	3,00%	109+000,000		9.436.576,646	748.465,570	87,158	87,839	-0,681							1,850	87,102	3,00%					2,048	87,702
-7,991	87,767	-7,850	87,340	-3,00%				-2,000	87,515	3,00%	109+020,000		9.436.578,295	748.485,502	87,455	88,249	-0,793							1,850	87,400	3,00%					2,086	88,114
-8,831	86,983	-7,850	87,637	-3,00%				-2,000	87,813	3,00%	109+040,000		9.436.579,945	748.505,434	87,753	88,471	-0,718							1,850	87,697	3,00%					2,022	88,217
-7,882	88,032	-7,850	87,935	-3,00%				-2,000	88,110	3,00%	109+060,000		9.436.581,594	748.525,366	88,050	88,646	-0,595							1,850	87,995	3,00%					2,117	87,817
-7,912	88,190	-7,850	88,232	-3,00%				-2,000	88,408	3,00%	109+080,000		9.436.583,244	748.545,298	88,348	88,814	-0,466							1,850	88,292	3,00%					1,979	88,684
-8,001	88,429	-7,850	88,530	-3,00%				-2,000	88,705	3,00%	109+100,000		9.436.584,893	748.565,230	88,645	89,037	-0,392							1,850	88,590	3,00%					1,912	88,778
-8,102	88,659	-7,850	88,827	-3,00%				-2,000	89,003	3,00%	109+120,000		9.436.586,543	748.585,162	88,943	89,334	-0,392							1,850	88,887	3,00%					1,917	89,089
-8,042	88,997	-7,850	89,125	-3,00%				-2,000	89,300	3,00%	109+140,000		9.436.588,192	748.605,093	89,240	89,687	-0,447							1,850	89,185	3,00%					1,926	89,415
-8,175	89,205	-7,850	89,422	-3,00%				-2,000	89,598	3,00%	109+160,000		9.436.589,842	748.625,025	89,538	89,958	-0,420							1,850	89,482	3,00%					1,914	89,677
-7,984	89,631	-7,850	89,720	-3,00%				-2,000	89,895	3,00%	109+180,000		9.436.591,491	748.644,957	89,835	90,245	-0,410							1,850	89,780	3,00%					1,928	90,017
-8,399	89,651	-7,850	90,017	-3,00%				-2,000	90,193	3,00%	109+200,000		9.436.593,141	748.664,889	90,133	90,501	-0,368							1,850	90,077	3,00%					1,942	90,356
-8,293	90,019	-7,850	90,315	-3,00%				-2,000	90,490	3,00%	109+220,000		9.436.594,790	748.684,821	90,430	90,858	-0,427							1,850	90,375	3,00%					1,963	90,717
-8,198	90,380	-7,850	90,612	-3,00%				-2,000	90,788	3,00%	109+240,000		9.436.596,440	748.704,753	90,728	91,160	-0,432							1,850	90,673	3,00%					1,944	90,956
-7,983	90,821	-7,850	90,910	-3,00%				-2,000	91,086	3,00%	109+260,000		9.436.598,089	748.724,685	91,026	91,284	-0,258							1,850	90,970	3,00%					1,886	91,078
-8,198	90,975	-7,850	91,208	-3,00%				-2,000	91,383	3,00%	109+280,000		9.436.599,739	748.744,616	91,323	91,807	-0,484							3,850	91,208	3,00%					3,979	91,336
-8,325	91,188	-7,850	91,505	-3,00%				-2,000	91,681	3,00%	109+300,000		9.436.601,388	748.764,548	91,621	92,110	-0,489							3,850	91,505	3,00%					4,275	91,930
-8,630	91,282	-7,850	91,803	-3,00%				-2,000	91,978	3,00%	109+320,000		9.436.603,038	748.784,480	91,918	92,301	-0,383							3,850	91,803	3,00%					3,909	91,764
-8,368	91,725	-7,850	92,070	-3,00%				-2,000	92,246	3,00%	109+340,000		9.436.604,687	748.804,412	92,186	92,651	-0,465							3,850	92,070	3,00%					4,078	92,298
-8,255	92,008	-7,850	92,279	-3,00%				-2,000	92,454	3,00%	109+360,000		9.436.606,337	748.824,344	92,394	92,919	-0,524							3,850	92,279	3,00%					4,225	92,654
-8,372	92,585	-8,205	92,417	-3,00%				-2,187	92,598	3,00%	109+378,202	PC	9.436.607,838	748.842,484	92,532	93,251	-0,719							3,850	92,417	3,00%					4,333	92,899
-8,541	92,639	-8,329	92,427	-3,00%				-2,240	92,610	3,00%	109+380,000		9.436.607,980	748.844,276	92,543	93,278	-0,735							3,850	92,427	3,00%					4,349	92,927

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-8,855	92,722	-8,576	92,443	-3,00%				-2,340	92,630	3,00%	109+382,944		9.436.608,184	748.847,214	92,560	93,322	-0,762							3,850	92,444	3,00%					4,380	92,975
-9,567	92,986	-9,048	92,467	-3,00%				-2,575	92,662	3,00%	109+387,687	PT	9.436.608,441	748.851,949	92,584	93,441	-0,856							3,850	92,469	3,00%					4,435	93,054
-11,004	93,151	-10,370	92,517	-3,00%				-3,260	92,730	3,00%	109+400,000		9.436.608,990	748.864,250	92,632	93,666	-1,034							3,850	92,517	3,00%					4,514	93,181
-12,338	93,257	-11,623	92,542	-3,00%				-3,873	92,775	3,00%	109+413,234	PC	9.436.609,581	748.877,471	92,659	93,713	-1,055							3,850	92,543	3,00%					4,593	93,286
-12,489	93,283	-11,751	92,545	-3,00%				-3,944	92,779	3,00%	109+415,481		9.436.609,687	748.879,716	92,660	93,718	-1,057							3,850	92,545	3,00%					4,544	93,239
-12,608	93,311	-11,842	92,545	-3,00%				-3,976	92,781	3,00%	109+417,729	PT	9.436.609,806	748.881,960	92,662	93,728	-1,067							3,850	92,546	3,00%					4,558	93,255
-12,756	93,397	-11,904	92,545	-3,00%				-4,001	92,782	3,00%	109+420,000		9.436.609,933	748.884,227	92,662	93,726	-1,064							3,850	92,547	3,00%					4,702	93,399
-14,028	94,625	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+440,000		9.436.611,050	748.904,196	92,662	93,795	-1,133							3,850	92,547	3,00%					4,776	93,472
-14,753	95,350	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+460,000		9.436.612,167	748.924,165	92,662	93,845	-1,183							3,850	92,547	3,00%					6,079	94,776
-14,410	95,006	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+480,000		9.436.613,283	748.944,134	92,662	93,876	-1,214							3,850	92,547	3,00%					6,725	95,421
-15,066	95,663	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+500,000		9.436.614,400	748.964,103	92,662	93,899	-1,237							3,850	92,547	3,00%					5,419	94,115
-17,425	98,022	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+520,000		9.436.615,517	748.984,071	92,662	93,862	-1,200							3,850	92,547	3,00%					8,115	96,811
-14,771	95,367	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+540,000		9.436.616,634	749.004,040	92,662	93,760	-1,098							3,850	92,547	3,00%					7,603	96,300
-13,967	94,564	-11,950	92,547	-3,00%				-4,050	92,784	3,00%	109+546,287	PC	9.436.616,985	749.010,317	92,662	93,710	-1,048							3,850	92,547	3,00%					7,458	96,155
-15,007	95,584	-11,969	92,547	-3,00%				-4,061	92,784	3,00%	109+550,691		9.436.617,211	749.014,716	92,662	93,693	-1,031							3,850	92,547	3,00%					5,263	93,959
-14,653	95,229	-11,969	92,544	-3,00%				-4,025	92,783	3,00%	109+555,096	PT	9.436.617,399	749.019,117	92,662	93,641	-0,979							3,850	92,547	3,00%					5,137	93,833
-14,404	95,074	-11,876	92,546	-3,00%				-4,007	92,782	3,00%	109+560,000		9.436.617,586	749.024,017	92,662	93,589	-0,927							3,850	92,547	3,00%					5,524	94,220
-12,223	94,309	-10,463	92,549	-3,00%				-3,345	92,762	3,00%	109+580,000		9.436.618,351	749.044,002	92,662	93,427	-0,765							3,850	92,547	3,00%					5,725	94,421
-12,153	94,270	-10,432	92,549	-3,00%				-3,331	92,762	3,00%	109+580,365	PC	9.436.618,365	749.044,368	92,662	93,421	-0,759							3,850	92,547	3,00%					5,791	94,488
-11,499	94,040	-10,008	92,549	-3,00%				-3,126	92,756	3,00%	109+585,149		9.436.618,571	749.049,147	92,662	93,392	-0,730							3,850	92,547	3,00%					5,545	94,241
-10,970	93,980	-9,538	92,548	-3,00%				-2,876	92,748	3,00%	109+589,933	PT	9.436.618,822	749.053,924	92,662	93,356	-0,694							3,850	92,547	3,00%					8,996	97,692
-9,952	93,966	-8,534	92,548	-3,00%				-2,375	92,733	3,00%	109+600,000		9.436.619,400	749.063,974	92,662	93,340	-0,678							3,850	92,547	3,00%					6,647	95,344
-10,179	94,862	-7,850	92,533	-3,00%				-2,000	92,709	3,00%	109+620,000		9.436.620,547	749.083,942	92,649	93,296	-0,647							3,850	92,533	3,00%					6,493	95,177
VIADUTO		-7,850	92,494	-3,00%				-2,000	92,670	3,00%	109+640,000		9.436.621,694	749.103,909	92,610	93,164	-0,554							3,850	92,494	3,00%					VIADUTO	
VIADUTO		-7,850	92,423	-3,00%				-2,000	92,598	3,00%	109+660,000		9.436.622,841	749.123,876	92,538	92,942	-0,404							4,317	92,409	3,00%					VIADUTO	
-8,735	93,223	-7,850	92,338	-3,00%				-2,000	92,513	3,00%	109+680,000		9.436.623,988	749.143,843	92,453	92,692	-0,239							4,550	92,317	3,00%					8,772	96,539
-8,715	93,174	-7,850	92,308	-3,00%				-2,000	92,484	3,00%	109+685,502	PC	9.436.624,303	749.149,336	92,424	92,734	-0,310							4,550	92,287	3,00%					8,772	96,509
-8,717	93,150	-7,850	92,283	-3,00%				-2,000	92,459	3,00%	109+689,857		9.436.624,552	749.153,684	92,399	92,728	-0,329							4,550	92,262	3,00%					8,797	96,509
-8,715	93,122	-7,850	92,257	-3,00%				-2,000	92,433	3,00%	109+694,213	PT	9.436.624,799	749.158,032	92,373	92,662	-0,289							4,550	92,236	3,00%					8,799	96,485
-8,786	93,156	-7,850	92,221	-3,00%				-2,000	92,396	3,00%	109+700,000		9.436.625,126	749.163,810	92,336	92,610	-0,274							4,550	92,200	3,00%					8,727	96,376
-8,519	92,746	-7,850	92,077	-3,00%				-2,000	92,253	3,00%	109+720,000		9.436.626,256	749.183,778	92,193	92,389	-0,197							4,550	92,056	3,00%					5,148	92,655
-8,621	92,679	-7,850	91,908	-3,00%				-2,000	92,083	3,00%	109+740,000		9.436.627,385	749.203,747	92,023	92,146	-0,122							4,550	91,887	3,00%					8,605	95,941
-8,425	92,287	-7,850	91,712	-3,00%				-2,000	91,888	3,00%	109+760,000		9.436.628,515	749.223,715	91,828	92,043	-0,215							4,550	91,691	3,00%					5,827	92,968
-8,732	92,386	-7,850	91,504	-3,00%				-2,000	91,679	3,00%	109+780,000		9.436.629,644	749.243,683	91,619	91,900	-0,281							4,550	91,483	3,00%					5,964	92,897
-8,090	91,535	-7,850	91,295	-3,00%				-2,000	91,471	3,00%	109+800,000		9.436.630,774	749.263,651	91,411	91,714	-0,304							4,550	91,274	3,00%					8,920	95,644
-8,454	91,691	-7,850	91,087	-3,00%				-2,000	91,262	3,00%	109+820,000		9.436.631,904	749.283,619	91,202	91,641	-0,439							4,550	91,066	3,00%					6,929	93,444
-8,498	91,526	-7,850	90,878	-3,00%				-2,000	91,053	3,00%	109+840,000		9.436.633,033	749.303,587	90,993	91,427	-0,434							4,550	90,857	3,00%					5,955	92,262
-8,676	91,495	-7,850	90,669	-3,00%				-2,000	90,845	3,00%	109+860,000		9.436.634,163	749.323,555	90,785	91,196	-0,411							4,550	90,648	3,00%					6,070	92,168
-8,820	91,431	-7,850	90,461	-3,00%				-2,000	90,636	3,00%	109+880,000		9.436.635,292	749.343,523	90,576	90,966	-0,389							4,550	90,440	3,00%					6,707	92,597
-7,935	90,338	-7,850	90,252	-3,00%				-2,000	90,428	3,00%	109+900,000		9.436.636,422	749.363,491	90,368	90,514	-0,146							4,550	90,231	3,00%					8,087	93,768
-8,046	90,240	-7,850	90,044	-3,00%				-2,000	90,219	3,00%	109+920,000		9.436.637,552	749.383,459	90,159	90,329	-0,170							4,550	90,023	3,00%					7,126	92,599
-7,893	89,806	-7,850	89,835	-3,00%				-2,000	90,011	3,00%	109+940,000		9.436.638,681	749.403,427	89,951	90,192	-0,242							4,550	89,814	3,00%					7,107	92,371
-7,912	89,688	-7,850	89,627	-3,00%				-2,000	89,802	3,00%	109+960,000		9.436.639,811	749.423,395	89,742	90,099	-0,357							4,550	89,606	3,00%					4,839	89,894
-7,987	89,554	-7,850	89,418	-3,00%				-2,000	89,593	3,00%	109+980,000		9.436.640,940	749.443,363	89,533	89,960	-0,426							4,550	89,397	3,00%					5,231	88,943
-8,391	88,885	-7,850	89,246	-3,00%				-2,000	89,421	3,00%	110+000,000		9.436.642,070	749.463,332	89,361	89,740	-0,379							3,850	89,246	3,00%					4,890	88,553
-11,426	86,763	-7,850	89,147	-3,00%				-2,000	89,323	3,00%	110+020,000		9.436.643,200	749.483,300	89,263	89,610	-0,347							3,850	89,147	3,00%					7,138	86,955
-13,295	85,473	-7,850	89,103	-3,00%				-2,000	89,279	3,00%	110+034,226	PC	9.436.644,003	749.497,503	89,219	89,360	-0,141							3,850	89,103	3,00%					10,327	84,785
-14,246	84,825	-7,850	89,090	-3,00%				-2,000	89,265	3,00%	110+038,533		9.436.644,247	749.501,803	89,205	89,345	-0,139							3,850	89,090	3,00%					9,705	85,187
-14,539	84,626	-7,850	89,085	-3,00%				-2,000	89,261	3,00%	110+040,000		9.436.644,331	749.503,268	89,201	89,339	-0,138							3,850	89,085	3,00%					9,757	85,147
-15,126	84,226	-7,850	89,076	-3,00%				-2,000	89,252	3,00%	110+042,841	PT	9.436.644,493	749.506,104	89,192	89,325	-0,133							3,850	89,076	3,00%					10,330	84,756
-17,808	82,384	-7,850	89,023	-3,00%				-2,000	89,199	3,00%	110+060,000		9.436.645,477	749.523,235	89,139	89,272	-0,133							3,850	89,023	3,00%					11,871	83,676
-19,993	80,866	-7,850	88,961	-3,00%				-2,000	89,137	3,00%	110+080,000		9.436.646,624	749.543,202	89,077	89,271	-0,194							3,850	88,961	3,00%					10,399	84,595
-20,403	80,530	-7,850	88,899	-3,00%				-2,000	89,074	3,00%	110+100,000		9.436.647,771	749.563,169	89,014	89,274	-0,259							3,850	88,899	3,00%					8,001	86,132
-18,583	81,682	-7,850	88,837	-3,00%				-2,000	89,012	3,00%	110+120,000		9.436.648,918	749.583,136	88,952	89,160	-0,207							3,850	88,837	3,00%					9,124	85,321
-17,419	82,396	-7,850	88,775	-3,00%				-2,000	88,950	3,00%	110+140,000		9.436.650,065	749.603,103	88,890	89,145	-0,255							3,850	88,775	3,00%					8,316	85,797
-16,520	82,969	-7,850	88,749	-3,00%				-2,000	88,925	3,00%	110+148,268	PC	9.436.650,539	749.611,358	88,865	89,181	-0,316							3,850	88,749	3,00%					8,276	85,799
-15,774	83,528	-8,004	88,708	-3,00%				-2,000	88,888	3,00%	110+160,000		9.436.651,059	749.623,078	88,828	89,147	-0,319							3,850	88,713	3,00%					7,670	86,166
-15,719	83,637	-8,140	88,691	-3,00%				-2,000	88,875	3,00%	110+164,333		9.436.651,173	749.627,409	88,815	89,144	-0,329							3,850	88,699	3,00%					7,531	86,246
-15,283	83,696	-7,850	88,651	-3,00%				-2,000	88,826	3,00%	110+180,000		9.436.651,240	749.643,075	88,766	89,169	-0,403							3,850	88,651	3,00%					6,762	86,709
-15,271	83,702	-7,850	88,649	-3,00%				-2,000	88,825	3,00%	110+180,397	PT	9.436.651,235	749.643,473	88,765	89,170	-0,405							3,850	88,649	3,00%					6,732	86,728
-15,077	83,817	-7,850	88,635	-3,00%				-2,000	88,811	3,00%	110+184,920	PC	9.436.651,171	749.647,995	88,751	89,181	-0,430							3,850	88,635	3,00%					6,283	87,014
-7,994	88,733	-7,850	88,589	-3,00%				-2,000	88,764	3,00%	110+200,000		9.436.650,203	749.663,037	88,704	89,164	-0,460							3,850	88,589	3,00%					4,768	87,977
-7,968	88,479	-7,850	88,557	-3,00%				-2,000	88,733	3,00%	110+220,000		9.436.646,601	749.682,695	88,673	89,280	-0,608							3,850	88,557	3,00%					5,282	87,603
-7,968	88,479	-7,850	88,557	-3,00%				-2,000	88,733	3,00%	110+220,000		9.436.646,601	749.682,695	88,673	89,280	-0,608							3,850	88,557	3,00%					5,282	87,603
-10,226	87,003	-7,850	88,587	-3,00%				-2,000	88,762	3,00%	110+240,000		9.436.640,417	749.701,700	88,702	89,348	-0,646							3,850	88,587	3,00%					5,670	87,373
-10,959	86,559	-7,850	88,632	-3,00%				-2,000	88,807	3,00%	110+255,081	PT	9.436.634,113	749.715,392	88,747	89,387	-0,640							3,850	88,632	3,00%					6,075	87,148
-11,169	86,434	-7,850	88,647	-3,00%				-2,000	88,822	3,00%	110+260,000		9.436.631,834	749.719,752	88,762	89,350	-0,588							3,850	88,647	3,00%					6,519	86,868
-11,689	86,113	-7,850	88,672	-3,00%				-2,000	88,847	3,00%	110+268,436	PC	9.436.627,925	749.727,227	88,787	89,370	-0,583							3,850	88,672	3,00%					6,361	86,998
-12,042	85,912	-7,850	88,707	-3,00%				-2,000	88,882	3,00%	110+280,000		9.436.622,282	749.737,320	88,822	89,482	-0,660							3,850	88,707	3,00%					6,042	87,245
-11,965	86,033	-7,850	88,776	-3,00%				-2,000	88,951	3,00%	110+300,000		9.436.611,218	749.753,971	88,891	89,422	-0,530							3,850	88,776	3,00%					6,422	87,061
-11,982	86,156	-7,850	88,910	-3,00%				-2,000	89,085	3,00%	110+320,000		9.436.598,593	749.769,472	89,025	89,512	-0,486							3,850	88,910	3,00%					6,081	87,422
-11,904	86,416	-7,850	89,118	-3,00%				-2,000	89,294	3,00%	110+340,000		9.436.584,524	749.783,676	89,234	89,730	-0,497							3,850	89,118	3,00%					6,244	87,522
-11,962	86,443	-7,850	89,185	-3,00%				-2,000	89,360	3,00%	110+345,244		9.436.580,612	749.787,169	89,300	89,834	-0,534							3,850	89,185	3,00%					6,304	87,549
-11,682	86,845	-7,850	89,400	-3,00%				-2,000	89,576	3,00%	110+360,000		9.436.569,144	749.796,449	89,516	90,149	-0,633							3,850	89,400	3,00%					5,859	88,061
-10,092	88,253	-7,850	89,747	-3,00%				-2,000	89,923	3,00%	110+380,000		9.436.552,599	749.807,672	89,863	90,458	-0,595							3,850	89,747	3,00%					6,024	88,298
-9,603	88,935	-7,850	90,104	-3,00%				-2,000	90,279	3,00%	110+400,000		9.436.535,044	749.817,238	90,219	90,768	-0,549							3,850	90,104	3,00%					4,865	89,427
-9,732	89,206	-7,850	90,460	-3,00%				-2,000	90,636	3,00%	110+420,000		9.436.516,644	749.825,056	90,576	91,124	-0,549							3,850	90,460	3,00%					4,598	89,962
-9,746	89,233	-7,850	90,497	-3,00%				-2,000	90,673	3,00%	110+422,053	PT	9.436.514,715	749.825,757	90,613	91,150	-0,537							3,850	90,497	3,00%					4,570	90,017
-9,330	89,866	-7,850	90,852	-3,00%				-2,000	91,028	3,00%	110+440,000		9.436.497,815	749.831,798	90,968	91,429	-0,461							3,850	90,852	3,00%					4,303	90,551
-9,705	90,080	-7,850	91,317	-3,00%				-2,000	91,492	3,00%	110+460,000		9.436.478,982	749.838,531	91,432	91,879	-0,447							3,850	91,317	3,00%					4,005	91,213
-9,416	90,772	-7,850	91,817	-3,00%				-2,000	91,992	3,00%	110+480,000		9.436.460,149	749.845,263	91,932	92,377	-0,445							3,850	91,817	3,00%					3,895	91,786
-9,111	91,476	-7,850	92,317	-3,00%				-2,000	92,492	3,00%	110+500,000		9.436.441,316	749.851,995	92,432	92,826	-0,394							3,850	92,317	3,00%					3,939	92,405
-9,087	91,992	-7,850	92,817	-3,00%				-2,000	92,992	3,00%	110+520,000		9.436.422,483	749.858,728	92,932	93,143	-0,211							3,850	92,817	3,00%					3,924	92,767
-8,070	93,170	-7,850	93,317	-3,00%				-2,000	93,492	3,00%	110+540,000		9.436.403,651	749.865,460	93,432	93,683	-0,251							3,850	93,317	3,00%					3,997	93,464
MURO		-5,850	93,877	-3,00%				-2,000	93,992	3,00%	110+560,000		9.436.384,818	749.872,192	93,932	94,296	-0,364							1,850	93,877	3,00%					MURO	
MURO		-5,850	94,377	-3,00%				-2,000	94,492	3,00%	110+580,000		9.436.365,985	749.878,925	94,432	94,860	-0,428							1,850	94,377	3,00%					MURO	
MURO		-5,850	94,877	-3,00%				-2,000	94,992	3,00%	110+600,000		9.436.347,152	749.885,657	94,932	95,304	-0,372							1,850	94,877	3,00%					MURO	
MURO		-5,850	95,377	-3,00%				-2,000	95,492	3,00%	110+620,000		9.436.328,319	749.892,389	95,432	95,898	-0,466							1,850	95,377	3,00%					MURO	
MURO		-5,850	95,877	-3,00%				-2,000	95,992	3,00%	110+640,000		9.436.309,486	749.899,121	95,932	96,441	-0,509							1,850	95,877	3,00%					MURO	
MURO		-5,850	96,377	-3,00%				-2,000	96,492	3,00%	110+660,000		9.436.290,653	749.905,854	96,432	97,003	-0,571							1,850	96,377	3,00%					MURO	
MURO		-5,850	96,877	-3,00%				-2,000	96,992	3,00%	110+680,000		9.436.271,821	749.912,586	96,932	97,517	-0,585							1,850	96,877	3,00%					MURO	
MURO		-5,850	97,377	-3,00%				-2,000	97,492	3,00%	110+700,000		9.436.252,988	749.919,318	97,432	98,088	-0,656							1,850	97,377	3,00%					MURO	
MURO		-5,850	97,877	-3,00%				-2,000	97,992	3,00%	110+720,000		9.436.234,155	749.926,051	97,932	98,625	-0,693							1,850	97,877	3,00%					MURO	
MURO		-5,850	98,377	-3,00%				-2,000	98,492	3,00%	110+740,000		9.436.215,322	749.932,783	98,432	99,036	-0,604							1,850	98,377	3,00%					MURO	
MURO		-5,850	98,863	-3,00%				-2,000	98,979	3,00%	110+760,000		9.436.196,489	749.939,515	98,919	99,500	-0,581							1,850	98,863	3,00%					MURO	
MURO		-5,850	99,257	-3,00%				-2,000	99,373	3,00%	110+780,000		9.436.177,656	749.946,248	99,313	99,941	-0,628							1,850	99,257	3,00%					MURO	
MURO		-5,850	99,545	-3,00%				-2,000	99,661	3,00%	110+800,000		9.436.158,824	749.952,980	99,601	100,338	-0,737							1,850	99,545	3,00%					MURO	
MURO		-5,850	99,588	-3,00%				-2,000	99,703	3,00%	110+803,788	PC	9.436.155,257	749.954,255	99,643	100,386	-0,742							1,850	99,588	3,00%					MURO	
MURO		-5,850	99,684	-3,00%				-2,000	99,799	3,00%	110+814,063		9.436.145,572	749.957,689	99,739	100,672	-0,932							1,850	99,684	3,00%					MURO	
MURO		-5,850	99,727	-3,00%				-2,000	99,842	3,00%	110+820,000		9.436.139,969	749.959,650	99,782	100,785	-1,002							1,850	99,727	3,00%					MURO	
MURO		-5,850	99,752	-3,00%				-2,000	99,868	3,00%	110+824,339	PT	9.436.135,870	749.961,073	99,808	100,824	-1,016							1,850	99,752	3,00%					MURO	
MURO		-5,850	99,803	-3,00%				-2,000	99,918	3,00%	110+840,000		9.436.121,069	749.966,193	99,858	100,922	-1,064							1,850	99,803	3,00%					MURO	

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
MURO		-5,850	99,772	-3,00%				-2,000	99,888	3,00%	110+860,000		9.436.102,168	749.972,732	99,828	101,125	-1,297							1,850	99,772	3,00%					MURO	
MURO		-5,852	99,678	-3,00%				-2,000	99,794	3,00%	110+875,705	PC	9.436.087,326	749.977,866	99,734	101,171	-1,437							1,850	99,679	3,00%					MURO	
MURO		-5,925	99,648	-3,00%				-2,018	99,765	3,00%	110+880,000		9.436.083,248	749.979,212	99,705	101,171	-1,467							1,850	99,649	3,00%					MURO	
MURO		-6,041	99,630	-3,00%				-2,092	99,749	3,00%	110+882,713		9.436.080,652	749.980,001	99,686	101,164	-1,478							1,850	99,631	3,00%					MURO	
MURO		-6,596	99,582	-3,00%				-2,361	99,709	3,00%	110+889,721	PT	9.436.073,886	749.981,823	99,638	101,162	-1,524							1,850	99,583	3,00%					MURO	
MURO		-7,659	99,512	-3,00%				-2,890	99,655	3,00%	110+900,000		9.436.063,900	749.984,262	99,568	101,161	-1,593							1,850	99,513	3,00%					MURO	
MURO		-9,193	99,415	-3,00%				-3,657	99,581	3,00%	110+914,817	PC	9.436.049,507	749.987,779	99,471	101,202	-1,730							1,850	99,416	3,00%					MURO	
MURO		-9,617	99,394	-3,00%				-3,895	99,566	3,00%	110+920,000		9.436.044,494	749.989,095	99,449	101,125	-1,676							1,850	99,394	3,00%					MURO	
-10,576	100,605	-9,763	99,386	-3,00%				-3,954	99,560	3,00%	110+922,557		9.436.042,038	749.989,809	99,441	101,087	-1,646							1,850	99,386	3,00%					2,799	100,810
-10,765	100,596	-9,952	99,377	-3,00%				-4,054	99,554	3,00%	110+930,297	PT	9.436.034,685	749.992,221	99,432	101,044	-1,612							1,850	99,377	3,00%					2,816	100,825
-10,746	100,567	-9,952	99,376	-3,00%				-4,045	99,553	3,00%	110+940,000		9.436.025,547	749.995,483	99,432	101,058	-1,626							1,850	99,377	3,00%					2,819	100,829
-10,695	100,491	-9,951	99,375	-3,00%				-4,031	99,553	3,00%	110+960,000		9.436.006,710	750.002,205	99,432	101,008	-1,576							1,850	99,377	3,00%					2,783	100,777
-10,653	100,427	-9,951	99,375	-3,00%				-4,018	99,553	3,00%	110+980,000		9.435.987,874	750.008,928	99,432	100,751	-1,319							1,850	99,377	3,00%					2,607	100,511
-10,548	100,258	-9,951	99,363	-3,00%				-4,005	99,541	3,00%	111+000,000		9.435.969,038	750.015,650	99,421	100,620	-1,199							1,850	99,366	3,00%					2,508	100,352
-10,452	100,028	-9,950	99,275	-3,00%				-3,992	99,454	3,00%	111+020,000		9.435.950,201	750.022,373	99,335	100,431	-1,096							1,850	99,279	3,00%					2,442	100,167
-10,482	99,899	-9,950	99,101	-3,00%				-3,978	99,281	3,00%	111+040,000		9.435.931,365	750.029,096	99,161	100,211	-1,049							1,850	99,106	3,00%					2,434	99,981
-10,193	99,445	-9,800	98,856	-3,00%				-3,965	99,031	3,00%	111+060,000		9.435.912,529	750.035,818	98,912	99,808	-0,896							1,850	98,857	3,00%					2,243	99,446
-10,145	99,376	-9,778	98,824	-3,00%				-3,964	98,999	3,00%	111+062,475	PC	9.435.910,198	750.036,650	98,880	99,725	-0,846							1,850	98,824	3,00%					2,217	99,375
-9,882	99,210	-9,565	98,734	-3,00%				-3,854	98,905	3,00%	111+069,418		9.435.903,715	750.039,134	98,790	99,529	-0,740							1,850	98,734	3,00%					2,166	99,208
-9,335	99,078	-9,045	98,643	-3,00%				-3,583	98,807	3,00%	111+076,361	PT	9.435.897,355	750.041,916	98,699	99,377	-0,678							1,850	98,644	3,00%					2,117	99,044
-8,941	98,997	-8,673	98,595	-3,00%				-3,394	98,754	3,00%	111+080,000		9.435.894,055	750.043,451	98,652	99,307	-0,655							1,850	98,597	3,00%					2,096	98,966
-6,982	98,785	-6,683	98,336	-3,00%				-2,407	98,464	3,00%	111+100,000		9.435.875,920	750.051,886	98,392	99,025	-0,633							1,850	98,337	3,00%					2,116	98,735
-6,848	98,770	-6,545	98,317	-3,00%				-2,337	98,443	3,00%	111+101,447	PC	9.435.874,608	750.052,496	98,373	99,014	-0,641							1,850	98,318	3,00%					2,122	98,725
-6,341	98,701	-6,023	98,225	-3,00%				-2,083	98,343	3,00%	111+108,561		9.435.868,089	750.055,342	98,281	98,933	-0,653							1,850	98,225	3,00%					2,145	98,667
-6,172	98,616	-5,850	98,133	-3,00%				-2,000	98,248	3,00%	111+115,675	PT	9.435.861,443	750.057,876	98,188	98,844	-0,655							1,850	98,133	3,00%					2,156	98,591
-6,174	98,562	-5,850	98,077	-3,00%				-2,000	98,192	3,00%	111+120,000		9.435.857,366	750.059,321	98,132	98,792	-0,660							1,850	98,077	3,00%					2,152	98,529
-6,194	98,333	-5,850	97,817	-3,00%				-2,000	97,932	3,00%	111+140,000		9.435.838,515	750.066,001	97,872	98,530	-0,658							1,850	97,817	3,00%					2,144	98,257
-6,234	98,132	-5,850	97,557	-3,00%				-2,000	97,672	3,00%	111+160,000		9.435.819,663	750.072,680	97,612	98,314	-0,702							1,850	97,557	3,00%					2,190	98,066
-6,219	97,850	-5,850	97,297	-3,00%				-2,000	97,412	3,00%	111+180,000		9.435.800,811	750.079,360	97,352	98,007	-0,655							1,850	97,297	3,00%					2,172	97,780
-6,173	97,520	-5,850	97,037	-3,00%				-2,000	97,152	3,00%	111+200,000		9.435.781,960	750.086,040	97,092	97,716	-0,624							1,850	97,037	3,00%					2,162	97,505
-6,175	97,239	-5,850	96,752	-3,00%				-2,000	96,868	3,00%	111+220,000		9.435.763,108	750.092,720	96,808	97,394	-0,586							1,850	96,752	3,00%					2,136	97,180
-6,110	96,808	-5,850	96,419	-3,00%				-2,000	96,534	3,00%	111+240,000		9.435.744,257	750.099,399	96,474	97,041	-0,567							1,850	96,419	3,00%					2,099	96,792
-6,104	96,441	-5,850	96,061	-3,00%				-2,000	96,176	3,00%	111+260,000		9.435.725,405	750.106,079	96,116	96,835	-0,719							1,850	96,061	3,00%					2,148	96,508
-6,201	96,230	-5,850	95,703	-3,00%				-2,000	95,818	3,00%	111+280,000		9.435.706,554	750.112,759	95,758	96,616	-0,858							1,850	95,703	3,00%					2,267	96,328
-6,017	95,708	-5,850	95,458	-3,00%				-2,000	95,573	3,00%	111+293,668	PC	9.435.693,670	750.117,324	95,513	96,384	-0,871							1,850	95,458	3,00%					2,237	96,039
-6,023	95,603	-5,850	95,345	-3,00%				-2,000	95,460	3,00%	111+300,000		9.435.687,670	750.119,344	95,400	96,300	-0,900							1,850	95,345	3,00%					2,201	95,870
-6,055	95,293	-5,850	94,987	-3,00%				-2,000	95,102	3,00%	111+320,000		9.435.668,344	750.124,461	95,042	95,989	-0,947							1,850	94,987	3,00%					2,315	95,684
-6,138	95,061	-5,850	94,629	-3,00%				-2,000	94,744	3,00%	111+340,000		9.435.648,604	750.127,624	94,684	95,595	-0,911							1,850	94,629	3,00%					2,302	95,307
-6,175	94,757	-5,850	94,271	-3,00%				-2,000	94,386	3,00%	111+360,000		9.435.628,647	750.128,800	94,326	95,341	-1,015							1,850	94,271	3,00%					2,238	94,852
-6,209	94,451	-5,850	93,913	-3,00%				-2,000	94,028	3,00%	111+380,000		9.435.608,672	750.127,978	93,968	94,890	-0,922							1,850	93,913	3,00%					2,279	94,556
-6,074	93,949	-5,850	93,613	-3,00%				-2,000	93,728	3,00%	111+396,738		9.435.592,087	750.125,760	93,668	94,569	-0,901							1,850	93,613	3,00%					2,236	94,192
-6,058	93,867	-5,850	93,555	-3,00%				-2,000	93,670	3,00%	111+400,000		9.435.588,880	750.125,166	93,610	94,552	-0,942							1,850	93,555	3,00%					2,228	94,121
-6,033	93,470	-5,850	93,197	-3,00%				-2,000	93,312	3,00%	111+420,000		9.435.569,466	750.120,392	93,252	94,287	-1,035							1,850	93,197	3,00%					2,208	93,734
-5,961	93,003	-5,850	92,837	-3,00%				-2,000	92,952	3,00%	111+440,000		9.435.550,627	750.113,704	92,892	93,981	-1,089							1,850	92,837	3,00%					2,287	93,493
-5,910	92,566	-5,850	92,477	-3,00%				-2,000	92,592	3,00%	111+460,000		9.435.532,549	750.105,168	92,532	93,585	-1,053							1,850	92,477	3,00%					2,210	93,016
-5,922	92,224	-5,850	92,117	-3,00%				-2,000	92,232	3,00%	111+480,000		9.435.515,413	750.094,871	92,172	93,294	-1,122							1,850	92,117	3,00%					2,232	92,689
-6,027	92,025	-5,850	91,760	-3,00%				-2,000	91,875	3,00%	111+499,809	PT	9.435.499,539	750.083,036	91,815	92,885	-1,070							1,850	91,760	3,00%					2,284	92,411
-6,024	92,017	-5,850	91,757	-3,00%				-2,000	91,872	3,00%	111+500,000		9.435.499,391	750.082,914	91,812	92,883	-1,071							1,850	91,757	3,00%					2,285	92,409
-5,889	91,690	-5,850	91,631	-3,00%				-2,000	91,746	3,00%	111+506,976	PC	9.435.494,012	750.078,472	91,686	92,760	-1,073							1,850	91,631	3,00%					2,311	92,322
-5,936	91,525	-5,850	91,397	-3,00%				-2,000	91,512	3,00%	111+520,000		9.435.484,341	750.069,755	91,452	92,631	-1,179							1,850	91,397	3,00%					2,382	92,194
-6,113	91,431	-5,850	91,037	-3,00%				-2,000	91,152	3,00%	111+540,000		9.435.471,056	750.054,824	91,092	92,258	-1,166							1,850	91,037	3,00%					2,463	91,956
-6,124	91,439	-5,850	91,028	-3,00%				-2,000	91,144	3,00%	111+540,450		9.435.470,781	750.054,469	91,084	92,248	-1,164							1,850	91,028	3,00%					2,464	91,950
-6,527	91,692	-5,850	90,677	-3,00%				-2,000	90,792	3,00%	111+560,000		9.435.459,874	750.038,260	90,732	91,978	-1,246							1,850	90,677	3,00%					2,505	91,659
-6,451	91,327	-5,850	90,426	-3,00%				-2,000	90,541	3,00%	111+573,923	PT	9.435.453,438	750.025,919	90,481	91,656	-1,175							1,850	90,426	3,00%					2,480	91,371
-6,441	91,203	-5,850	90,317	-3,00%				-2,000	90,432	3,00%	111+580,000		9.435.450,881	750.020,407	90,372	91,473	-1,101							1,850	90,317	3,00%					2,431	91,188
-6,374	90,752	-5,850	89,966	-3,00%				-2,000	90,081	3,00%	111+600,000		9.435.442,466	750.002,264	90,021	90,722	-0,701							1,850	89,966	3,00%					2,164	90,436
-6,284	90,329	-5,850	89,678	-3,00%				-2,000	89,793	3,00%	111+620,000		9.435.434,050	749.984,120	89,733	90,473	-0,740							1,850	89,678	3,00%					2,218	90,229
-6,197	89,982	-5,850	89,462	-3,00%				-2,000	89,577	3,00%	111+640,000		9.435.425,634	749.965,977	89,517	90,340	-0,823							1,850	89,462	3,00%					2,266	90,085
-6,269	89,969	-5,850	89,340	-3,00%				-2,000	89,456	3,00%	111+656,077	PC	9.435.418,869	749.951,392	89,396	90,155	-0,759							1,850	89,340	3,00%					2,209	89,878
-6,328	89,986	-5,881	89,316	-3,00%				-1,996	89,433	3,00%	111+660,000		9.435.417,247	749.947,821	89,373	90,105	-0,732							1,850	89,318	3,00%					2,218	89,869
-6,473	89,985	-6,011	89,293	-3,00%				-2,079	89,411	3,00%	111+664,983		9.435.415,266	749.943,249	89,348	90,082	-0,734							1,850	89,293	3,00%					2,205	89,825
-6,968	89,851	-6,574	89,259	-3,00%				-2,352	89,386	3,00%	111+673,889	PT	9.435.411,956	749.934,981	89,315	90,459	-1,143							1,850	89,260	3,00%					2,168	89,737
-7,539	89,787	-7,178	89,245	-3,00%				-2,654	89,381	3,00%	111+680,000		9.435.409,786	749.929,269	89,301	90,170	-0,869							1,850	89,246	3,00%					2,166	89,719
-9,181	89,253	-9,169	89,235	-3,00%				-3,642	89,401	3,00%	111+700,000		9.435.402,683	749.910,572	89,292	90,056	-0,764							1,850	89,237	3,00%					2,233	89,811
-9,297	89,265	-9,277	89,235	-3,00%				-3,697	89,403	3,00%	111+701,087	PC	9.435.402,297	749.909,556	89,292	90,060	-0,768							1,850	89,237	3,00%					2,234	89,812
-12,347	88,243	-10,900	89,208	-3,00%				-4,050	89,413	3,00%	111+708,172		9.435.399,687	749.902,970	89,292	90,060	-0,768							1,850	89,237	3,00%					2,222	89,795
-12,324	88,259	-10,900	89,208	-3,00%				-4,050	89,414	3,00%	111+715,256	PT	9.435.396,892	749.896,460	89,292	90,072	-0,780							1,850	89,237	3,00%					2,237	89,817
-12,347	88,243	-10,900	89,208	-3,00%				-4,050	89,413	3,00%	111+720,000		9.435.394,959	749.892,128	89,292	90,077	-0,785							1,850	89,237	3,00%					2,242	89,824
-12,356	88,238	-10,900	89,208	-3,00%				-4,050	89,413	3,00%	111+740,000		9.435.386,809	749.873,864	89,292	90,050	-0,758							1,850	89,237	3,00%					2,231	89,808
-14,332	86,920	-10,900	89,208	-3,00%				-4,049	89,413	3,00%	111+760,000		9.435.378,658	749.855,600	89,292	89,925	-0,633							1,850	89,237	3,00%					2,137	89,667
-12,051	88,440	-10,900	89,208	-3,00%				-4,049	89,413	3,00%	111+780,000		9.435.370,508	749.837,337	89,292	89,901	-0,609							1,850	89,237	3,00%					2,174	89,722
-13,302	87,607	-10,900	89,208	-3,00%				-4,049	89,413	3,00%	111+800,000		9.435.362,357	749.819,073	89,292	89,987	-0,695							1,850	89,237	3,00%					2,219	89,790
-11,723	88,702	-10,900	89,250	-3,00%				-4,049	89,455	3,00%	111+820,000		9.435.354,207	749.800,809	89,334	90,053	-0,719							1,850	89,279	3,00%					2,203	89,808
-9,959	89,337	-9,947	89,319	-3,00%				-4,049	89,496	3,00%	111+828,015	PC	9.435.350,941	749.793,490	89,374	90,067	-0,693							1,850	89,319	3,00%					2,215	89,867
-9,843	89,452	-9,780	89,358	-3,00%				-3,958	89,533	3,00%	111+834,058		9.435.348,411	749.788,001	89,414	90,111	-0,697							1,850	89,358	3,00%					2,210	89,898
-9,444	89,555	-9,343	89,403	-3,00%				-3,728	89,572	3,00%	111+840,000		9.435.345,796	749.782,666	89,460	90,197	-0,737							1,850	89,405	3,00%					2,126	89,819
-9,431	89,551	-9,333	89,404	-3,00%				-3,723	89,573	3,00%	111+840,101	PT	9.435.345,750	749.782,576	89,461	90,197	-0,736							1,850	89,405	3,00%					2,126	89,819
-7,495	90,030	-7,218	89,614	-3,00%				-2,669	89,750	3,00%	111+860,000		9.435.336,772	749.764,817	89,670	90,277	-0,607							1,850	89,615	3,00%					2,124	90,026
-6,909	90,151	-6,602	89,690	-3,00%				-2,362	89,817	3,00%	111+865,784	PC	9.435.334,163	749.759,656	89,746	90,283	-0,537							1,850	89,691	3,00%					2,098	90,062
-6,374	90,269	-6,051	89,785	-3,00%				-2,096	89,904	3,00%	111+872,316		9.435.331,292	749.753,788	89,841	90,432	-0,591							1,850	89,786	3,00%					2,119	90,189
-6,299	90,560	-5,852	89,889	-3,00%				-2,001	90,005	3,00%	111+878,848	PT	9.435.328,576	749.747,848	89,945	90,593	-0,648							1,850	89,889	3,00%					2,168	90,367
-6,293	90,572	-5,850	89,909	-3,00%				-2,000	90,024	3,00%	111+880,000		9.435.328,111	749.746,794	89,964	90,608	-0,644							1,850	89,909	3,00%					2,175	90,396
-6,171	90,768	-5,850	90,287	-3,00%				-2,000	90,402	3,00%	111+900,000		9.435.320,032	749.728,499	90,342	91,263	-0,921							1,850	90,287	3,00%					2,322	90,995
-6,304	91,388	-5,850	90,707	-3,00%				-2,000	90,822	3,00%	111+920,000		9.435.311,953	749.710,203	90,762	91,844	-1,082							1,850	90,707	3,00%					2,461	91,622
-6,282	91,774	-5,850	91,127	-3,00%				-2,000	91,242	3,00%	111+940,000		9.435.303,874	749.691,907	91,182	92,391	-1,209							1,850	91,127	3,00%					2,579	92,220
-6,398	92,368	-5,850	91,547	-3,00%				-2,000	91,662	3,00%	111+960,000		9.435.295,795	749.673,612	91,602	92,863	-1,261							1,850	91,547	3,00%					2,628	92,714
-6,406	92,800	-5,850	91,967	-3,00%				-2,000	92,082	3,00%	111+980,000		9.435.287,716	749.655,316	92,022	93,249	-1,227							1,850	91,967	3,00%					2,556	93,026
-6,355	93,144	-5,850	92,387	-3,00%				-2,000	92,502	3,00%	112+000,000		9.435.279,637	749.637,021	92,442	93,644	-1,202							1,850	92,387	3,00%					2,640	93,571
-6,309	93,494	-5,850	92,807	-3,00%				-2,000	92,922	3,00%	112+020,000		9.435.271,558	749.618,725	92,862	93,956	-1,094							1,850	92,807	3,00%					2,537	93,837
-6,223	93,786	-5,850	93,227	-3,00%				-2,000	93,342	3,00%	112+040,000		9.435.263,479	749.600,429	93,282	94,140	-0,858							1,850	93,227	3,00%					2,370	94,006
-6,229	94,215	-5,850	93,647	-3,00%				-2,000	93,762	3,00%	112+060,000		9.435.255,400	749.582,134	93,702	94,511	-0,809							1,850	93,647	3,00%					2,309	94,335
-6,191	94,554	-5,850	94,043	-3,00%				-2,000	94,158	3,00%	112+080,000		9.435.247,321	749.563,838	94,098	94,849	-0,751							1,850	94,043	3,00%					2,228	94,610
-6,100	94,767	-5,850	94,391	-3,00%				-2,000	94,507	3,00%	112+100,000		9.435.239,242	749.545,542	94,447	95,237	-0,790							1,850	94,391	3,00%					2,243	94,981
-6,224	95,276	-5,850	94,716	-3,00%				-2,000	94,831	3,00%	112+120,000		9.435.231,163	749.527,247	94,771	95,655	-0,884							1,850	94,716	3,00%					2,293	95,380
-6,265	95,663	-5,850	95,041	-3,00%				-2,000	95,156	3,00%	112+140,000		9.435.223,084	749.508,951	95,096	96,012	-0,916							1,850	95,041	3,00%					2,349	95,789
-6,142	95,803	-5,850	95,365	-3,00%				-2,000	95,481	3,00%	112+160,000		9.435.215,005	749.490,655	95,421	96,323	-0,902							1,850	95,365	3,00%					2,303	96,045
-6,007	95,925	-5,850	95,690	-3,00%				-2,000	95,805	3,00%	112+180,000		9.435.206,926	749.472,360	95,745	96,716	-0,971							1,850	95,690	3,00%					2,280	96,335
-6,367	96,790	-5,850	96,015	-3,00%				-2,000	96,130	3,00%	112+200,000		9.435.198,847	749.454,064	96,070	97,112	-1,042							1,850	96,015	3,00%					2,338	96,746
-5,944	96,474	-5,850	96,333	-3,00%				-2,000	96,449	3,00%	112+220,000		9.435.190,768	749.435,769	96,389	97,358	-0,969							1,850	96,333	3,00%					2,272	96,966
-6,026	96,873	-5,850	96,610	-3,00%				-2,000	96,725	3,00%	112+240,000		9.435.182,689	749.417,473	96,665	97,586	-0,921							1,850	96,610	3,00%					2,204	97,141
-6,067	97,163	-5,850	96,838	-3,00%				-2,000	96,953	3,00%	112+260,000		9.435.174,610	749.399,177	96,893	97,748	-0,855							1,850	96,838	3,00%					2,119	97,241
-6,039	97,300	-5,850	97,017	-3,00%				-2,000	97,133	3,00%	112+280,000		9.435.166,531	749.380,882	97,073	97,915	-0,842							1,850	97,017	3,00%					2,080	97,362

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 01

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO											EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO													
Offset		BORDO			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			BANQUETA 1 - BORDO INTERNO		BANQUETA 1 - BORDO EXTERNO		Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Afast. (m)	Cota (m)
-5,981	97,346	-5,850	97,149	-3,00%				-2,000	97,265	3,00%	112+300,000		9.435.158,452	749.362,586	97,205	98,146	-0,941							1,850	97,149	3,00%					2,125	97,561
-6,129	97,651	-5,850	97,232	-3,00%				-2,000	97,348	3,00%	112+320,000		9.435.150,373	749.344,290	97,288	98,158	-0,870							1,850	97,232	3,00%					2,107	97,618
-6,207	97,804	-5,850	97,267	-3,00%				-2,000	97,383	3,00%	112+340,000		9.435.142,294	749.325,995	97,323	98,210	-0,887							1,850	97,267	3,00%					2,126	97,682
-6,347	98,000	-5,850	97,254	-3,00%				-2,000	97,370	3,00%	112+360,000		9.435.134,215	749.307,699	97,310	98,270	-0,961							1,850	97,254	3,00%					2,183	97,754
-6,324	97,903	-5,850	97,193	-3,00%				-2,000	97,308	3,00%	112+380,000		9.435.126,136	749.289,403	97,248	98,227	-0,979							1,850	97,193	3,00%					2,287	97,848
-6,292	97,746	-5,850	97,083	-3,00%				-2,000	97,198	3,00%	112+400,000		9.435.118,057	749.271,108	97,138	98,049	-0,910							1,850	97,083	3,00%					2,230	97,653
-6,270	97,555	-5,850	96,925	-3,00%				-2,000	97,040	3,00%	112+420,000		9.435.109,978	749.252,812	96,980	97,940	-0,960							1,850	96,925	3,00%					MURO	
-6,275	97,494	-5,850	96,856	-3,00%				-2,000	96,972	3,00%	112+427,180	PC	9.435.107,078	749.246,244	96,912	97,846	-0,934							1,850	96,856	3,00%					MURO	
-6,264	97,361	-5,836	96,718	-3,00%				-1,986	96,833	3,00%	112+440,000		9.435.101,914	749.234,510	96,774	97,659	-0,885							1,850	96,718	3,00%					MURO	
-6,281	97,229	-5,850	96,582	-3,00%				-2,000	96,698	3,00%	112+451,149		9.435.097,448	749.224,295	96,638	97,569	-0,932							1,850	96,582	3,00%					MURO	
-6,300	97,138	-5,850	96,463	-3,00%				-1,987	96,579	3,00%	112+460,000		9.435.093,919	749.216,178	96,519	97,491	-0,971							1,850	96,464	3,00%					2,351	97,216
-6,240	96,824	-5,850	96,239	-3,00%				-2,000	96,355	3,00%	112+475,118	PT	9.435.087,924	749.202,299	96,295	97,141	-0,846							1,850	96,239	3,00%					2,315	96,937
-6,194	96,677	-5,850	96,161	-3,00%				-2,000	96,276	3,00%	112+480,000		9.435.085,995	749.197,814	96,216	97,050	-0,833							1,850	96,161	3,00%					2,271	96,792
-6,196	96,329	-5,850	95,810	-3,00%				-2,000	95,925	3,00%	112+500,000		9.435.078,092	749.179,442	95,865	96,685	-0,820							1,850	95,810	3,00%					2,274	96,446
-6,307	96,096	-5,850	95,410	-3,00%				-2,000	95,526	3,00%	112+520,000		9.435.070,188	749.161,070	95,466	96,351	-0,886							1,850	95,410	3,00%					2,357	96,171
-6,346	95,706	-5,850	94,962	-3,00%				-2,000	95,078	3,00%	112+540,000		9.435.062,285	749.142,698	95,018	96,051	-1,033							1,850	94,962	3,00%					2,432	95,835
-6,385	95,275	-5,850	94,473	-3,00%				-2,000	94,588	3,00%	112+560,000		9.435.054,382	749.124,325	94,528	95,501	-0,973							1,850	94,473	3,00%					2,312	95,165
-6,285	94,628	-5,850	93,977	-3,00%				-2,000	94,092	3,00%	112+580,000		9.435.046,479	749.105,953	94,032	94,929	-0,897							1,850	93,977	3,00%					2,334	94,703
-6,417	94,331	-5,850	93,481	-3,00%				-2,000	93,596	3,00%	112+600,000		9.435.038,576	749.087,581	93,536	94,563	-1,027							1,850	93,481	3,00%					2,351	94,232
-6,334	93,710	-5,850	92,985	-3,00%				-2,000	93,100	3,00%	112+620,000		9.435.030,672	749.069,209	93,040	93,973	-0,933							1,850	92,985	3,00%					2,323	93,694
-6,394	93,305	-5,850	92,489	-3,00%				-2,000	92,604	3,00%	112+640,000		9.435.022,769	749.050,836	92,544	93,454	-0,910							1,850	92,489	3,00%					2,335	93,216
-6,255	92,601	-5,850	91,993	-3,00%				-2,000	92,108	3,00%	112+660,000		9.435.014,866	749.032,464	92,048	92,947	-0,899							1,850	91,993	3,00%					2,327	92,708
-6,320	92,231	-5,850	91,526	-3,00%				-2,000	91,641	3,00%	112+680,000		9.435.006,963	749.014,092	91,581	92,304	-0,723							1,850	91,526	3,00%					2,132	91,948
-6,461	92,033	-5,850	91,117	-3,00%				-2,000	91,232	3,00%	112+700,000		9.434.999,060	748.995,720	91,172	91,839	-0,667							1,850	91,117	3,00%					2,079	91,460
-6,270	91,392	-5,850	90,762	-3,00%				-2,000	90,877	3,00%	112+719,080	PC	9.434.991,520	748.978,193	90,817	91,362	-0,545							1,850	90,762	3,00%					2,033	91,036
-6,272	91,374	-5,853	90,745	-3,00%				-1,991	90,861	3,00%	112+720,000		9.434.991,159	748.977,346	90,802	91,350	-0,548							1,850	90,746	3,00%					2,028	91,013
-6,459	91,273	-6,037	90,639	-3,00%				-2,090	90,758	3,00%	112+726,468		9.434.988,769	748.971,337	90,695	91,178	-0,483							1,850	90,639	3,00%					2,022	90,897
-7,033	91,174	-6,601	90,527	-3,00%				-2,364	90,654	3,00%	112+733,856	PT	9.434.986,359	748.964,354	90,583	91,130	-0,547							1,850	90,527	3,00%					2,076	90,867
-7,602	91,023	-7,214	90,441	-3,00%				-2,672	90,578	3,00%	112+740,000		9.434.984,498	748.958,498	90,498	91,071	-0,574							1,850	90,442	3,00%					2,129	90,860
-9,714	90,975	-9,208	90,216	-3,00%				-3,665	90,382	3,00%	112+759,690	PC	9.434.978,533	748.939,733	90,272	91,173	-0,901							1,850	90,217	3,00%					2,304	90,897
-9,749	90,979	-9,238	90,213	-3,00%				-3,684	90,380	3,00%	112+760,000		9.434.978,439	748.939,438	90,270	91,174	-0,904							1,850	90,214	3,00%					2,306	90,899
-10,332	90,999	-9,765	90,149	-3,00%				-3,955	90,324	3,00%	112+767,342		9.434.976,031	748.932,503	90,205	91,129	-0,924							1,850	90,149	3,00%					2,323	90,859
-10,441	90,830	-9,950	90,093	-3,00%				-4,050	90,270	3,00%	112+774,993	PT	9.434.973,163	748.925,410	90,148	90,991	-0,843							1,850	90,093	3,00%					2,251	90,695
-10,380	90,707	-9,950	90,062	-3,00%				-4,050	90,239	3,00%	112+780,000		9.434.971,168	748.920,818	90,118	90,974	-0,856							1,850	90,062	3,00%					2,246	90,657
-10,376	90,625	-9,950	89,986	-3,00%				-4,050	90,163	3,00%	112+800,000		9.434.963,200	748.902,474	90,042	90,828	-0,787							1,850	89,986	3,00%					2,187	90,491
-10,253	90,431	-9,950	89,977	-3,00%				-4,050	90,154	3,00%	112+820,000		9.434.955,233	748.884,130	90,032	90,704	-0,672							1,850	89,977	3,00%					2,061	90,293
-10,268	90,453	-9,950	89,977	-3,00%				-4,050	90,154	3,00%	112+840,000		9.434.947,265	748.865,785	90,032	90,682	-0,650							1,850	89,977	3,00%					1,984	90,177
-10,233	90,401	-9,950	89,977	-3,00%				-4,050	90,154	3,00%	112+860,000		9.434.939,297	748.847,441	90,032	90,488	-0,456							1,850	89,977	3,00%					MURO	
-12,516	88,818	-10,900	89,896	-3,00%				-4,050	90,101	3,00%	112+880,000		9.434.931,329	748.829,097	89,980	89,791	0,188							1,850	89,924	3,00%					MURO	
-12,390	88,847	-10,900	89,841	-3,00%				-4,050	90,046	3,00%	112+888,617	PC	9.434.927,896	748.821,193	89,925	89,447	0,477							1,850	89,869	3,00%					MURO	
-9,774	89,813	-9,768	89,804	-3,00%				-3,957	89,978	3,00%	112+896,271		9.434.924,669	748.814,254	89,859	89,311	0,548							1,850	89,804	3,00%					MURO	
-11,845	88,850	-10,510	89,739	-3,00%				-3,875	89,938	3,00%	112+900,000		9.434.922,970	748.810,934	89,822	89,195	0,627							1,850	89,767	3,00%					MURO	
-11,768	88,657	-10,213	89,694	-3,00%				-3,697	89,890	3,00%	112+903,925	PT	9.434.921,093	748.807,488	89,779	89,099	0,680							1,850	89,723	3,00%					MURO	
-10,027	88,656	-8,799	89,475	-3,00%				-2,988	89,649	3,00%	112+920,000		9.434.913,220	748.793,472	89,560	88,878	0,681							1,850	89,504	3,00%					MURO	
-8,950	88,256	-7,510	89,215	-3,00%				-2,346	89,370	3,00%	112+934,683	PC	9.434.906,029	748.780,670	89,300	88,796	0,504							1,850	89,244	3,00%					MURO	
-8,443	88,217	-7,109	89,106	-3,00%				-2,124	89,256	3,00%	112+940,000		9.434.903,508	748.775,990	89,192	88,888	0,304							1,850	89,137	3,00%					MURO	
-8,364	88,128	-6,975	89,054	-3,00%				-2,084	89,201	3,00%	112+942,544		9.434.902,360	748.773,719	89,139	88,916	0,223							1,850	89,083	3,00%					MURO	
-8,185	87,966	-6,800	88,889	-3,00%				-2,000	89,033	3,00%	112+950,405	PT	9.434.899,061	748.766,585	88,973	88,872	0,101							1,850	88,918	3,00%					MURO	
-7,961	87,911	-6,800	88,829	-3,00%				-2,000	88,829	3,00%	112+960,000		9.434.895,262	748.757,774	88,769	88,722	0,047							1,850	88,714	3,00%					MURO	
-7,409	87,835	-6,800	88,241	-3,00%				-2,000	88,385	3,00%	112+980,000		9.434.887,345	748.739,408	88,325	88,368	-0,043							1,850	88,270	3,00%					MURO	
-5,866	87,825	-5,850	87,802	-3,00%				-2,000	87,917	3,00%	113+000,000		9.434.879,428	748.721,041	87,857	88,075	-0,218							1,850	87,802	3,00%					MURO	
-6,017	87,563	-5,850	87,313	-3,00%				-2,000	87,428	3,00%	113+020,000		9.434.871,511	748.702,675	87,368	87,715	-0,347							1,850	87,313	3,00%					MURO	
-6,107	87,206	-5,850	86,821	-3,00%				-2,000	86,936	3,00%	113+040,000		9.434.863,594	748.684,309	86,876	87,335	-0,459							1,850	86,821	3,00%					MURO	
-6,154	86,784	-5,850	86,329	-3,00%				-2,000	86,444	3,00%	113+060,000		9.434.855,677	748.665,943	86,384	86,926	-0,542							1,850	86,329	3,00%					2,036	86,608
-6,178	86,328	-5,850	85,837	-3,00%				-2,000	85,952	3,00%	113+080,000		9.434.847,760	748.647,576	85,892	86,589	-0,697							1,850	85,837	3,00%					2,149	86,284
-6,252	85,948	-5,850	85,345	-3,00%				-2,000	85,460	3,00%	113+100,000		9.434.839,843	748.629,210	85,400	86,090	-0,690							1,850	85,345	3,00%					2,115	85,742
-6,304	85,533	-5,850	84,853	-3,00%				-2,000	84,968	3,00%	113+120,000		9.434.831,926	748.610,844	84,908	85,462	-0,554							1,850	84,853	3,00%					2,034	85,129
-6,443	85,249	-5,850	84,361	-3,00%				-2,000	84,476	3,00%	113+140,000		9.434.824,009	748.592,477	84,416	85,283	-0,867							1,850	84,361	3,00%					2,181	84,857
-6,375	84,656	-5,850	83,869	-3,00%				-2,000	83,984	3,00%	113+160,000		9.434.816,092	748.574,111	83,924	84,658	-0,734							1,850	83,869	3,00%					2,157	84,329
-6,476	84,315	-5,850	83,377	-3,00%				-2,000	83,492	3,00%	113+180,000		9.434.808,175	748.555,745	83,432	84,064	-0,632							1,850	83,377	3,00%					2,134	83,803
-6,502	83,862	-5,850	82,885	-3,00%				-2,000	83,000	3,00%	113+200,000		9.434.800,258	748.537,379	82,940	83,525	-0,585							1,850	82,885	3,00%					2,112	83,278
-6,539	83,426	-5,850	82,393	-3,00%				-2,000	82,508	3,00%	113+220,000		9.434.792,341	748.519,012	82,448	83,163	-0,715							1,850	82,393	3,00%					2,180	82,887
-6,565	82,973	-5,850	81,901	-3,00%				-2,000	82,016	3,00%	113+240,000		9.434.784,424	748.500,646	81,956	82,785	-0,829							1,850	81,901	3,00%					2,223	82,460
-6,635	82,586	-5,850	81,409	-3,00%				-2,000	81,524	3,00%	113+260,000		9.434.776,507	748.482,280	81,464	82,349	-0,885							1,850	81,409	3,00%					2,261	82,024
-6,616	82,066	-5,850	80,917	-3,00%				-2,000	81,032	3,00%	113+280,000		9.434.768,590	748.463,913	80,972	81,841	-0,869							1,850	80,917	3,00%					2,279	81,559
-6,585	81,527	-5,850	80,425	-3,00%				-2,000	80,540	3,00%	113+300,000		9.434.760,673	748.445,547	80,480	81,417	-0,937							1,850	80,425	3,00%					2,351	81,176
-6,683	81,182	-5,850	79,933	-3,00%				-2,000	80,048	3,00%	113+320,000		9.434.752,756	748.427,181	79,988	81,006	-1,018							1,850	79,933	3,00%					2,387	80,738
-6,596	80,559	-5,850	79,441	-3,00%				-2,000	79,556	3,00%	113+340,000		9.434.744,839	748.408,815	79,496	80,626	-1,130							1,850	79,441	3,00%					2,505	80,423
-6,800	80,675	-5,850	79,249	-3,00%				-2,000	79,365	3,00%	113+347,776	PC	9.434.741,760	748.401,673	79,305	80,455	-1,150							1,850	79,249	3,00%					2,523	80,259
-6,800	80,555	-5,850	79,130	-3,00%				-2,000	79,245	3,00%	113+352,622		9.434.739,844	748.397,222	79,185	80,354	-1,168							1,850	79,130	3,00%					2,531	80,151
-6,819	80,465	-5,850	79,011	-3,00%				-2,000	79,126	3,00%	113+357,468	PT	9.434.737,932	748.392,769	79,066	80,230	-1,163							1,850	79,011	3,00%					2,532	80,033
-6,835	80,426	-5,850	78,949	-3,00%				-2,000	79,064	3,00%	113+360,000		9.434.736,935	748.390,443	79,004	80,166	-1,162							1,850	78,949	3,00%					2,533	79,972
-6,913	80,061	-5,850	78,466	-3,00%				-2,000	78,581	3,00%	113+380,000		9.434.729,053	748.372,061	78,521	79,733	-1,212							1,850	78,466	3,00%					2,548	79,513
-6,791	79,460	-5,850	78,049	-3,00%				-2,000	78,164	3,00%	113+400,000		9.434.721,172	748.353,679	78,104	79,300	-1,196							1,850	78,049	3,00%					2,547	79,094
-6,848	79,203	-5,850	77,706	-3,00%				-2,000	77,822	3,00%	113+420,000		9.434.713,291	748.335,298	77,762	78,870	-1,108							1,850	77,706	3,00%					2,477	78,646
-6,713	78,733	-5,850	77,438	-3,00%				-2,000	77,554	3,00%	113+440,000		9.434.705,409	748.316,916	77,494	78,320	-0,826							1,850	77,438	3,00%					2,341	78,175
-6,585	78,348	-5,850	77,245	-3,00%				-2,000	77,361	3,00%	113+460,000		9.434.697,528	748.298,535	77,301	77,979	-0,678							1,850	77,245	3,00%					2,190	77,755
-6,577	78,218	-5,850	77,127	-3,00%				-2,000	77,242	3,00%	113+480,000		9.434.689,646	748.280,153	77,182	77,816	-0,634							1,850	77,127	3,00%					2,154	77,583
-6,603	78,226	-5,850	77,097	-3,00%				-2,000	77,212	3,00%	113+489,609	PC	9.434.685,860	748.271,322	77,152	77,741	-0,589							1,850	77,097	3,00%					2,162	77,564
-6,761	78,183	-6,029	77,085	-3,00%				-2,085	77,203	3,00%	113+496,842		9.434.683,171	748.264,608	77,141	77,734	-0,593							1,850	77,085	3,00%					2,175	77,574
-6,864	78,045	-6,222	77,082	-3,00%				-2,160	77,204	3,00%	113+500,000		9.434.682,099	748.261,637	77,139	77,773	-0,634							1,850	77,083	3,00%					2,189	77,592
-7,270	78,120	-6,579	77,083	-3,00%				-2,353	77,210	3,00%	113+504,076	PT	9.434.680,808	748.257,772	77,139	77,817	-0,678							1,850	77,084	3,00%					MURO	
-8,913	78,176	-8,199	77,105	-3,00%				-3,162	77,256	3,00%	113+520,000		9.434.675,971	748.242,600	77,161	77,850	-0,690							1,850	77,105	3,00%					MURO	
-9,939	78,227	-9,201	77,120	-3,00%				-3,661	77,286	3,00%	113+529,735	PC	9.434.673,015	748.233,325	77,176	77,909	-0,733							1,850	77,120	3,00%					MURO	
		-9,763	77,130	-3,00%				-3,954	77,304	3,00%	113+537,425		9.434.670,492	748.226,061	77,186	78,135	-0,949							1,850	77,130	3,00%						
-10,618	78,259	-9,867	77,134	-3,00%				-4,029	77,309	3,00%	113+540,000		9.434.669,565	748.223,659	77,188	78,061	-0,873							1,850	77,133	3,00%					MURO	
-10,761	78,352	-9,950	77,136	-3,00%				-4,050	77,313	3,00%	113+545,116	PT	9.434.667,600	748.218,935	77,191	78,122	-0,931							1,850	77,136	3,00%					MURO	
-10,775	78,375	-9,950	77,137	-3,00%				-4,050	77,314	3,00%	113+560,000		9.434.661,652	748.205,292	77,192	78,409	-1,217							1,850	77,137	3,00%					MURO	
-10,791	78,399	-9,950	77,137	-3,00%				-4,050	77,314	3,00%	113+580,000		9.434.653,658	748.186,958	77,192	78,485	-1,293							1,850	77,137	3,00%					2,386	77,941
-10,824	78,448	-9,950	77,137	-3,00%				-4,050	77,314	3,00%	113+600,000		9.434.645,665	748.168,625	77,192	78,509	-1,317							1,850	77,137	3,00%					2,445	78,029
-10,857	78,497	-9,950	77,137	-3,00%				-4,050	77,314	3,00%	113+620,000		9.434.637,672	748.150,292	77,192	78,538	-1,346							1,850	77,137	3,00%					2,482	78,085
											113+640,000	FIM	9.434.629,678	748.131,959	77,192	78,552	-1,360														

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 02

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO					EIXO						PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO									
Offset		BORDO			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	D1			D2			BORDO			Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)
-5,451	68,348	-3,870	69,402	3,00%	205+200,000		9.436.379,637	745.833,035	69,518	69,173	0,345	1,979	69,577	3,00%				7,829	69,402	-3,00%	7,936	69,508
-5,977	67,994	-3,850	69,412	3,00%	205+220,000		9.436.376,735	745.852,779	69,528	69,201	0,327	2,005	69,588	3,00%				7,855	69,495	-1,59%	9,273	68,550
-6,586	67,557	-3,850	69,381	3,00%	205+240,000		9.436.374,237	745.872,779	69,497	68,628	0,869	2,394	69,568	3,00%				8,248	69,643	1,28%	10,461	68,170
-7,598	66,834	-3,850	69,333	3,00%	205+260,000		9.436.372,375	745.892,780	69,448	68,654	0,794	3,346	69,548	3,00%				9,276	69,871	5,45%	12,895	67,466
-8,807	65,975	-3,850	69,279	3,00%	205+280,000		9.436.371,156	745.912,517	69,395	68,657	0,738	4,436	69,528	3,00%				10,944	70,123	9,14%	16,685	66,321
-9,754	65,290	-3,850	69,226	3,00%	205+300,000		9.436.370,540	745.932,760	69,342	68,891	0,451	5,465	69,506	3,00%	9,314	70,486	25,46%	13,192	70,376	-2,84%	20,819	65,335
-10,698	64,607	-3,850	69,173	3,00%	205+320,000		9.436.370,560	745.952,780	69,288	69,590	-0,302							3,850	69,173	-3,00%		
-10,735	64,530	-3,850	69,120	3,00%	205+340,000		9.436.371,193	745.972,476	69,235	69,702	-0,467							3,850	69,120	-3,00%	4,080	69,349
-12,523	63,289	-3,850	69,072	3,00%	205+360,000		9.436.372,481	745.992,781	69,187	69,631	-0,444							3,850	69,072	-3,00%	4,269	69,490
-12,464	63,245	-3,850	68,988	3,00%	206+400,000		9.436.458,288	747.031,780	69,103	68,190	0,913	2,000	69,163	3,00%				9,230	68,946	-3,00%	20,567	61,389
-12,145	63,646	-3,850	69,176	3,00%	206+420,000		9.436.459,940	747.051,780	69,291	68,180	1,111	2,000	69,351	3,00%	6,000	69,231	-3,00%	6,809	69,255	3,00%	EIXO LINHA 4	
-12,195	63,800	-3,850	69,363	3,00%	206+440,000		9.436.461,592	747.071,780	69,479	68,435	1,044	2,000	69,539	3,00%	6,000	69,419	-3,00%	7,924	69,477	3,00%	EIXO LINHA 4	
-12,477	63,800	-3,850	69,551	3,00%	206+460,000		9.436.463,244	747.091,780	69,667	68,464	1,203	2,000	69,727	3,00%	6,000	69,607	-3,00%	8,000	69,667	3,00%	EIXO LINHA 4	
-12,758	63,800	-3,850	69,739	3,00%	206+480,000		9.436.464,896	747.111,780	69,854	68,480	1,374	2,000	69,914	3,00%	4,000	69,854	-3,00%	7,850	69,849	-0,13%	EIXO LINHA 4	
-12,673	64,044	-3,850	69,927	3,00%	206+500,000		9.436.466,547	747.131,780	70,042	68,488	1,554	2,000	70,102	3,00%	4,000	70,042	-3,00%	7,850	69,994	-1,25%	EIXO LINHA 4	
-12,856	64,111	-3,850	70,115	3,00%	206+520,000		9.436.468,199	747.151,780	70,230	68,724	1,506	2,000	70,290	3,00%	4,000	70,230	-3,00%	7,850	70,020	-5,45%	EIXO LINHA 4	
-12,875	64,286	-3,850	70,302	3,00%	206+540,000		9.436.469,851	747.171,780	70,418	68,681	1,737	2,000	70,478	3,00%	4,000	70,418	-3,00%	7,850	70,302	-3,00%	10,582	68,564
-12,797	64,525	-3,850	70,490	3,00%	206+560,000		9.436.471,503	747.191,780	70,606	68,791	1,815	2,000	70,666	3,00%	4,000	70,606	-3,00%	7,850	70,490	-3,00%	12,491	67,396

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA 04

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO															EIXO					PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO				
Offset		BORDO			E3			E2			E1			km	Pontos Notáveis da Geometria	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	BORDO			Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)
EIXO LINHA 1		-3,850	69,634	-3,00%							-3,850	69,634	-3,00%	400+000,000	INÍCIO	9.436.455,760	747.098,107	69,750	67,985	1,764	3,850	69,634	3,00%	14,618	62,456
EIXO LINHA 1		-2,661	69,926	-3,00%							-1,146	69,972	3,00%	400+020,000		9.436.454,919	747.118,089	69,937	67,066	2,871	3,850	69,822	3,00%	14,263	62,880
EIXO LINHA 1		-3,299	69,967	-3,00%							-1,390	70,024	3,00%	400+025,083	PC	9.436.454,705	747.123,168	69,983	67,040	2,943	3,850	69,867	3,00%	14,199	62,968
EIXO LINHA 1		-4,111	69,994	-3,00%							-1,502	70,072	3,00%	400+030,777		9.436.454,384	747.128,853	70,027	67,310	2,718	3,850	69,912	3,00%	14,173	63,030
EIXO LINHA 1		-5,096	70,019	-3,00%							-1,773	70,119	3,00%	400+036,472	PT	9.436.453,902	747.134,526	70,065	67,638	2,427	3,850	69,950	3,00%	14,122	63,102
EIXO LINHA 1		-5,745	70,025	-3,00%							-1,862	70,142	3,00%	400+040,000		9.436.453,553	747.138,038	70,086	67,707	2,379	3,850	69,970	3,00%	14,055	63,167
EIXO LINHA 1		-6,366	70,029	-3,00%							-1,945	70,161	3,00%	400+043,381	PC	9.436.453,219	747.141,402	70,103	67,861	2,243	3,850	69,988	3,00%	13,996	63,223
EIXO LINHA 1		-8,296	70,040	-3,00%							-2,220	70,222	3,00%	400+060,000		9.436.450,885	747.157,851	70,155	67,889	2,266	3,850	70,040	3,00%	13,523	63,591
EIXO LINHA 1		-8,726	70,056	-3,00%							-2,385	70,246	3,00%	400+072,719		9.436.448,171	747.170,275	70,174	68,040	2,135	3,850	70,059	3,00%	13,381	63,705
EIXO LINHA 1		-8,975	70,070	-3,00%							-2,559	70,262	3,00%	400+080,000		9.436.446,260	747.177,300	70,185	68,121	2,064	3,850	70,070	3,00%	13,415	63,693
-15,716	66,062	-9,664	70,097	-3,00%							-2,860	70,301	3,00%	400+100,000		9.436.439,697	747.196,184	70,215	67,721	2,495	3,850	70,100	3,00%	13,147	63,902
-16,135	65,836	-9,735	70,103	-3,00%							-2,939	70,307	3,00%	400+102,056	PT	9.436.438,915	747.198,086	70,218	67,716	2,502	3,850	70,103	3,00%	13,117	63,925
-18,078	64,645	-9,850	70,130	-3,00%							-3,000	70,335	3,00%	400+120,000		9.436.432,004	747.214,645	70,245	67,865	2,380	3,850	70,130	3,00%	13,830	63,477
-18,898	64,117	-9,850	70,149	-3,00%							-3,000	70,355	3,00%	400+132,917	PC	9.436.427,029	747.226,566	70,265	67,825	2,440	3,850	70,149	3,00%	13,796	63,518
-18,859	64,171	-9,891	70,150	-3,00%							-2,854	70,361	3,00%	400+140,000		9.436.424,194	747.233,056	70,275	67,959	2,316	3,850	70,160	3,00%	13,704	63,591
-17,297	65,325	-10,019	70,177	-3,00%							-2,879	70,392	3,00%	400+160,000		9.436.415,047	747.250,834	70,305	69,256	1,049	3,850	70,190	3,00%	12,857	64,185
-16,924	65,606	-10,048	70,191	-3,00%							-3,000	70,402	3,00%	400+164,522		9.436.412,751	747.254,729	70,312	69,346	0,966	3,850	70,197	3,00%	12,704	64,294
-15,729	66,488	-10,146	70,210	-3,00%							-2,988	70,425	3,00%	400+180,000		9.436.404,281	747.267,680	70,335	68,459	1,876	3,850	70,220	3,00%	12,162	64,679
-12,862	68,488	-10,246	70,232	-3,00%							-3,000	70,449	3,00%	400+196,126	PT	9.436.394,485	747.280,485	70,359	69,196	1,164	3,850	70,244	3,00%	11,128	65,392
-12,208	68,872	-10,250	70,178	-3,00%							-2,000	70,425	3,00%	400+200,000		9.436.392,017	747.283,471	70,365	69,095	1,271	3,850	70,250	3,00%	11,171	65,369
-4,131	70,538	-2,500	70,489	3,00%										400+212,039	PC	9.436.384,347	747.292,750	70,414	69,228	1,186	3,850	70,298	3,00%	11,416	65,254
-3,261	70,532	-2,500	70,509	3,00%										400+220,000		9.436.379,195	747.298,820	70,434	69,594	0,840	3,850	70,319	3,00%	11,334	65,329
-2,744	70,855	-2,500	70,610	3,00%										400+240,000		9.436.365,567	747.313,453	70,535	69,993	0,543	3,850	70,420	3,00%	11,164	65,544
-2,915	71,198	-2,500	70,783	3,00%										400+260,000		9.436.351,007	747.327,159	70,708	70,291	0,417	3,850	70,593	3,00%	10,692	66,031
-2,941	71,459	-2,500	71,018	3,00%										400+280,000		9.436.335,577	747.339,879	70,943	70,298	0,645	3,850	70,827	3,00%	10,081	66,674
-3,148	71,910	-2,500	71,262	3,00%										400+300,000		9.436.319,345	747.351,556	71,187	71,944	-0,757	3,850	71,071	3,00%	4,583	71,804
-3,344	72,349	-2,500	71,506	3,00%										400+320,380		9.436.302,380	747.362,141	71,431	73,545	-2,115	3,850	71,315	3,00%	5,483	72,948
-3,648	72,897	-2,500	71,749	3,00%										400+340,000		9.436.284,755	747.371,588	71,674	74,017	-2,343	3,850	71,559	3,00%	6,706	74,415
-3,634	73,127	-2,500	71,993	3,00%										400+360,000		9.436.266,548	747.379,855	71,918	74,423	-2,505	3,850	71,803	3,00%	6,828	74,780
-3,787	73,524	-2,500	72,237	3,00%										400+380,000		9.436.247,837	747.386,908	72,162	74,827	-2,665	3,850	72,046	3,00%	6,831	75,027
-3,627	73,608	-2,500	72,481	3,00%										400+400,000		9.436.228,702	747.392,715	72,406	75,125	-2,719	3,850	72,290	3,00%	6,480	74,920
-3,532	73,711	-2,500	72,679	3,00%										400+416,257		9.436.212,894	747.396,501	72,604	75,069	-2,465	3,850	72,488	3,00%	6,170	74,808
-3,534	73,759	-2,500	72,725	3,00%										400+420,000		9.436.209,227	747.397,252	72,650	75,054	-2,405	3,850	72,534	3,00%	6,096	74,780
-3,547	74,016	-2,500	72,968	3,00%										400+440,000		9.436.189,496	747.400,499	72,893	75,100	-2,207	3,850	72,778	3,00%	6,112	75,039
-3,776	74,488	-2,500	73,212	3,00%										400+460,000		9.436.169,595	747.402,441	73,137	75,186	-2,048	3,850	73,022	3,00%	5,791	74,963
-3,768	74,724	-2,500	73,456	3,00%										400+480,000		9.436.149,608	747.403,071	73,381	75,215	-1,834	3,850	73,266	3,00%	5,514	74,929
-3,632	74,832	-2,500	73,700	3,00%										400+500,000		9.436.129,623	747.402,386	73,625	75,246	-1,621	3,850	73,509	3,00%	5,293	74,952
-3,835	75,279	-2,500	73,944	3,00%										400+520,000		9.436.109,727	747.400,388	73,869	75,294	-1,426	3,850	73,753	3,00%	5,113	75,016
-3,639	75,326	-2,500	74,187	3,00%										400+540,000		9.436.090,005	747.397,087	74,112	75,494	-1,382	3,850	73,997	3,00%	5,056	75,203
-3,363	75,287	-2,500	74,424	3,00%										400+560,000		9.436.070,543	747.392,496	74,349	75,489	-1,140	3,850	74,233	3,00%	4,898	75,281
-3,189	75,295	-2,500	74,607	3,00%										400+580,000		9.436.051,425	747.386,636	74,532	75,465	-0,934	3,850	74,416	3,00%	4,667	75,233
-3,066	75,294	-2,500	74,728	3,00%										400+600,000		9.436.032,733	747.379,531	74,653	75,467	-0,813	3,850	74,538	3,00%	4,554	75,242
-3,077	75,366	-2,500	74,789	3,00%										400+620,000		9.436.014,549	747.371,213	74,714	75,475	-0,760	3,850	74,599	3,00%	4,415	75,164
-3,073	75,363	-2,500	74,790	3,00%										400+620,476	PT	9.436.014,123	747.371,001	74,715	75,482	-0,767	3,850	74,600	3,00%	4,434	75,183
-3,338	75,635	-2,500	74,797	3,00%										400+640,000		9.435.996,658	747.362,272	74,722	75,783	-1,061	3,850	74,607	3,00%	4,764	75,520
-3,351	75,648	-2,500	74,797	3,00%										400+660,000		9.435.978,768	747.353,331	74,722	75,822	-1,100	3,850	74,607	3,00%	4,841	75,598
-3,362	75,659	-2,500	74,797	3,00%										400+674,502	PC	9.435.965,796	747.346,848	74,722	75,841	-1,119	3,850	74,607	3,00%	4,855	75,612
-3,367	75,664	-2,500	74,797	3,00%										400+680,000		9.435.960,913	747.344,322	74,722	75,845	-1,123	3,850	74,607	3,00%	4,863	75,619
-3,375	75,672	-2,500	74,797	3,00%										400+700,000		9.435.943,776	747.334,027	74,722	75,851	-1,129	3,850	74,607	3,00%	4,868	75,625
-3,384	75,681	-2,500	74,797	3,00%										400+716,210		9.435.930,695	747.324,460	74,722	75,851	-1,129	3,850	74,607	3,00%	4,865	75,621
-3,386	75,683	-2,500	74,797	3,00%										400+720,000		9.435.927,752	747.322,073	74,722	75,849	-1,127	3,850	74,607	3,00%	4,863	75,620
-3,475	75,772	-2,500	74,797	3,00%										400+740,000		9.435.913,002	747.308,578	74,722	75,840	-1,118	3,850	74,607	3,00%	4,842	75,599
-3,477	75,774	-2,500	74,797	3,00%										400+757,919	PT	9.435.900,989	747.295,291	74,722	75,820	-1,098	3,850	74,607	3,00%	4,802	75,559
-3,409	75,706	-2,500	74,797	3,00%										400+760,000		9.435.899,664	747.293,686	74,722	75,810	-1,088	3,850	74,607	3,00%	4,796	75,553
-3,353	75,650	-2,500	74,797	3,00%										400+780,000		9.435.886,930	747.278,264	74,722	75,716	-0,994	3,850	74,607	3,00%	4,695	75,452
-3,901	75,624	-2,912	74,635	-3,00%										400+800,000		9.435.875,162	747.262,141	74,722	75,699	-0,977	3,850	74,607	3,00%	4,660	75,416
		-0,595	74,740	3,00%										400+820,000		9.435.864,447	747.245,253	74,722	75,638	-0,916	3,850	74,607	3,00%	4,628	75,384
		-2,078	74,784	3,00%										400+837,685	PC	9.435.854,972	747.230,320	74,722	75,598	-0,876	3,850	74,607	3,00%	4,594	75,350
		-2,329	74,792	3,00%										400+853,717		9.435.853,717	747.228,375	74,722	75,588	-0,866	3,850	74,607	3,00%	4,582	75,338
		-2,422	74,795	3,00%										400+840,947		9.435.853,194	747.227,585	74,722	75,586	-0,864	3,850	74,607	3,00%	4,577	75,334
		-2,694	74,803	3,00%										400+844,210	PT	9.435.851,358	747.224,889	74,722	75,579	-0,857	3,850	74,607	3,00%	4,565	75,322
-1,851	75,352	-1,514	74,677	-3,00%										400+860,000		9.435.842,326	747.211,936	74,722	75,526	-0,804	1,486	74,677	3,00%	1,800	75,305
-1,817	75,283	-1,514	74,677	-3,00%										400+880,000		9.435.830,887	747.195,531	74,722	75,449	-0,727	1,486	74,677	3,00%	1,759	75,222
-1,801	75,252	-1,514	74,677	-3,00%										400+900,000		9.435.819,448	747.179,125	74,722	75,419	-0,697	1,486	74,677	3,00%	1,743	75,190
-1,806	75,262	-1,514	74,677	-3,00%										400+920,000		9.435.808,009	747.162,719	74,722	75,440	-0,718	1,486	74,677	3,00%	1,754	75,213
-4,556	75,312	-3,850	74,607	-3,00%										400+940,000		9.435.796,569	747.146,314	74,722	75,444	-0,722	1,486	74,677	3,00%	1,755	75,214
-4,416	75,173	-3,850	74,607	-3,00%										400+960,000		9.435.785,130	747.129,908	74,722	75,329	-0,607	1,486	74,677	3,00%	1,698	75,100
-4,222	74,978	-3,850	74,607	-3,00%										400+980,000		9.435.773,691	747.113,502	74,722	75,135	-0,413	1,486	74,677	3,00%	1,614	74,934
-5,713	74,798	-5,491	74,576	-3,00%							-0,815	74,716	3,00%	401+000,000		9.435.762,252	747.097,097	74,692	75,096	-0,404	3,850	74,577	3,00%	4,334	75,060
-7,617	74,836	-7,355	74,575	-3,00%							-1,724	74,744	3,00%	401+011,953	PC	9.435.755,415	747.087,292	74,692	75,098	-0,406	3,850	74,577	3,00%	4,184	74,910
-9,150	74,837	-8,891	74,577	-3,00%							-2,537	74,768	3,00%	401+020,000		9.435.750,638	747.080,818	74,692	75,013	-0,321	3,850	74,577	3,00%	4,071	74,797
-12,954	74,928	-12,603	74,576	-3,00%							-4,374	74,823	3,00%	401+040,000		9.435.737,322	747.065,915	74,692	73,626	1,066	3,850	74,577	3,00%	4,687	74,018
-14,931	74,939	-14,565	74,573	-3,00%							-5,294	74,851	3,00%	401+051,013		9.435.729,178	747.058,505	74,692	73,449	1,243	3,850	74,577	3,00%	4,046	74,772
-16,421	74,882	-16,115	74,576	-3,00%							-6,118	74,876	3,00%	401+060,000		9.435.722,143	747.052,914	74,692	74,824	-0,132	3,850	74,577	3,00%	4,627	75,354
-18,914	74,945	-18,545	74,576	-3,00%							-7,335	74,912	3,00%	401+080,000		9.435.705,371	747.042,047	74,692	75,878	-1,186	3,850	74,577	3,00%	4,872	75,598
-19,254	74,980	-18,850	74,576	-3,00%							-7,488	74,917	3,00%	401+090,074	PT	9.435.696,413	747.037,443	74,692	76,137	-1,445	3,850	74,577	3,00%	4,949	75,675
-19,287	75,013	-18,850	74,576	-3,00%	-15,000	74,691	3,00%	-14,569	74,678	-3,00%	-7,056	74,904	3,00%	401+100,000		9.435.687,437	747.033,206	74,692	75,769	-1,077	3,850	74,577	3,00%	4,866	75,593
-19,347	75,073	-18,850	74,576	-3,00%	-15,000	74,691	3,00%	-13,314	74,641	-3,00%	-5,801	74,866	3,00%	401+120,000		9.435.669,351	747.024,667	74,692	75,237	-0,545	3,850	74,577	3,00%	5,000	75,726
-19,389	75,115	-18,850	74,576	-3,00%	-15,000	74,691	3,00%	-12,191	74,607	-3,00%	-4,679	74,832	3,00%	401+140,000		9.435.651,265	747.016,128	74,692	75,997	-1,305	3,850	74,577	3,00%	5,063	75,789
OFICINA														401+160,000		9.435.633,179	747.007,590	74,722	76,007	-1,285				OFICINA	
OFICINA														401+180,000		9.435.615,094	746.999,051	74,722	76,022	-1,300				OFICINA	
OFICINA														401+200,000		9.435.597,008	746.990,513	74,722	77,149	-2,427				OFICINA	
OFICINA														401+220,000		9.435.578,922	746.981,974	74,722	76,967	-2,245				OFICINA	
OFICINA														401+240,000		9.435.560,837	746.973,436	74,722	76,730	-2,008				OFICINA	
OFICINA														401+260,000		9.435.542,751	746.964,897	74,722	76,404	-1,682				OFICINA	
OFICINA														401+280,000		9.435.524,665	746.956,358	74,722	76,223	-1,501				OFICINA	
OFICINA														401+300,000		9.435.506,580	746.947,820	74,692	75,801	-1,109				OFICINA	
OFICINA														401+314,541	FIM	9.435.493,431	746.941,612	74,692	75,588	-0,896				OFICINA	

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA AV. HIGINO CUNHA

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO					EIXO							PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO				
Offset		BORDO			km	Pontos Notáveis da	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	BORDO			Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)
CONTENÇÃO		-7,000	70,752	-2,00%	0+000,000	INÍCIO	9.436.414,868	745.397,337	70,892	71,163	-0,271	7,000	70,752	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	70,272	-2,00%	0+020,000		9.436.416,244	745.417,289	70,412	70,627	-0,215	7,000	70,272	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	70,066	-2,00%	0+029,243	PC	9.436.416,880	745.426,510	70,206	70,423	-0,217	7,000	70,066	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,867	-2,00%	0+040,000		9.436.417,562	745.437,246	70,007	70,283	-0,276	7,000	69,867	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,787	-2,00%	0+045,154	PT	9.436.417,848	745.442,392	69,927	70,224	-0,297	7,000	69,787	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,612	-2,00%	0+060,000		9.436.418,633	745.457,217	69,752	70,081	-0,329	7,000	69,612	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,545	-2,00%	0+067,410	PC	9.436.419,026	745.464,617	69,685	70,150	-0,465	7,000	69,545	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,432	-2,00%	0+080,000		9.436.419,731	745.477,187	69,572	70,086	-0,514	7,000	69,432	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,389	-2,00%	0+084,809	PT	9.436.420,022	745.481,987	69,529	70,077	-0,548	7,000	69,389	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	69,210	-2,00%	0+100,000		9.436.420,957	745.497,149	69,350	70,103	-0,754	7,000	69,210	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,000	68,690	-2,00%	0+120,000		9.436.422,189	745.517,111	68,830	70,171	-1,341	7,000	68,690	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	67,826	-2,00%	0+140,000		9.436.423,421	745.537,073	67,970	70,169	-2,200	7,200	67,826	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	66,668	-2,00%	0+160,000		9.436.424,653	745.557,035	66,812	70,019	-3,207	7,200	66,668	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	65,618	-2,00%	0+180,000		9.436.425,885	745.576,997	65,762	69,913	-4,151	7,200	65,618	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	64,868	-2,00%	0+200,000		9.436.427,116	745.596,959	65,012	69,571	-4,559	7,200	64,868	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,358	64,415	-2,00%	0+220,000		9.436.428,348	745.616,921	64,562	69,224	-4,662	7,307	64,416	2,00%	CONTENÇÃO	
TÚNEL					0+240,000		9.436.429,580	745.636,883	64,412	69,163	-4,751				TÚNEL	
TÚNEL					0+260,000		9.436.430,812	745.656,845	64,412	69,315	-4,903				TÚNEL	
TÚNEL					0+280,000		9.436.432,044	745.676,807	64,412	69,568	-5,156				TÚNEL	
CONTENÇÃO		-7,450	64,292	-2,00%	0+300,000		9.436.433,276	745.696,769	64,441	69,707	-5,266	7,570	64,290	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	64,531	-2,00%	0+320,000		9.436.434,508	745.716,731	64,675	69,410	-4,736	7,200	64,531	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	64,997	-2,00%	0+340,000		9.436.435,739	745.736,693	65,141	69,173	-4,032	7,200	64,997	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	65,668	-2,00%	0+360,000		9.436.436,971	745.756,655	65,812	68,944	-3,132	7,200	65,668	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	66,344	-2,00%	0+380,000		9.436.438,203	745.776,617	66,488	68,671	-2,183	7,200	66,344	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	66,851	-2,00%	0+400,000		9.436.439,435	745.796,580	66,995	68,258	-1,264	7,200	66,851	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	67,164	-2,00%	0+420,000		9.436.440,667	745.816,542	67,308	67,982	-0,674	7,200	67,164	2,00%	CONTENÇÃO	
CONTENÇÃO		-7,200	67,308	-2,00%	0+440,000	FIM	9.436.441,899	745.836,504	67,452	67,703	-0,251	7,200	67,308	2,00%	CONTENÇÃO	

NOTA DE SERVIÇO DE TERRAPLENAGEM - LINHA AV. HIGINO CUNHA - DESVIO PROVISÓRIO

PLATAFORMA DE TERRAPLENAGEM - LADO ESQUERDO					EIXO							PLATAFORMA DE TERRAPLENAGEM - LADO DIREITO				
Offset		BORDO			km	Pontos Notáveis da	Coordenada		Cota de Projeto	Cota Terreno	Diferença (m)	BORDO			Offset	
Afast. (m)	Cota (m)	Afast. (m)	Cota (m)	Incl. (%)			N	E				Afast. (m)	Cota (m)	Incl. (%)	Afast. (m)	Cota (m)
-3,279	69,636	-3,150	69,508	-3,00%	0+000,000	INÍCIO	9.436.463,632	745.594,006	69,602	70,159	-0,557	3,150	69,508	3,00%	3,654	70,011
-3,247	69,587	-3,150	69,490	-3,00%	0+005,776	PC	9.436.461,333	745.599,305	69,585	70,112	-0,527	3,150	69,490	3,00%	3,628	69,968
-4,194	68,751	-3,150	69,448	-3,00%	0+020,000		9.436.456,298	745.612,603	69,542	69,992	-0,450	3,150	69,448	3,00%	3,539	69,836
-7,870	66,241	-3,150	69,388	-3,00%	0+040,000		9.436.451,395	745.631,977	69,482	69,347	0,135	3,150	69,388	3,00%	3,624	69,861
-7,912	66,201	-3,150	69,375	-3,00%	0+044,068	PT	9.436.450,716	745.635,988	69,470	69,443	0,027	3,150	69,375	3,00%	3,719	69,944
-7,574	66,378	-3,150	69,328	-3,00%	0+060,000		9.436.448,272	745.651,731	69,422	67,287	2,135	3,150	69,328	3,00%	3,465	69,643
-6,617	66,982	-3,150	69,293	-3,00%	0+071,511	PC	9.436.446,505	745.663,106	69,388	67,450	1,938	3,150	69,293	3,00%	3,287	69,202
-5,960	67,396	-3,150	69,269	-3,00%	0+080,000		9.436.444,966	745.671,453	69,364	67,474	1,890	3,150	69,269	3,00%	3,550	69,669
-3,172	69,245	-3,150	69,223	-3,00%	0+100,000		9.436.439,494	745.690,675	69,318	69,444	-0,126	3,150	69,223	3,00%	3,528	69,602
-3,225	69,276	-3,150	69,201	-3,00%	0+113,074	PT	9.436.434,555	745.702,775	69,295	69,658	-0,363	3,150	69,201	3,00%	3,630	69,680
-3,498	69,540	-3,150	69,191	-3,00%	0+120,000		9.436.431,660	745.709,067	69,286	69,611	-0,325	3,150	69,191	3,00%	3,642	69,683
-3,417	69,438	-3,150	69,172	-3,00%	0+140,000		9.436.423,302	745.727,237	69,266	69,421	-0,155	3,150	69,172	3,00%	3,430	69,452
-3,557	69,560	-3,150	69,154	-3,00%	0+160,000		9.436.414,943	745.745,407	69,248	69,583	-0,335	3,150	69,154	3,00%	3,729	69,733
-3,717	69,702	-3,150	69,136	-3,00%	0+180,000		9.436.406,585	745.763,576	69,230	69,787	-0,557	3,150	69,136	3,00%	3,934	69,919
-3,544	69,511	-3,150	69,118	-3,00%	0+200,000		9.436.398,227	745.781,746	69,212	69,380	-0,168	3,150	69,118	3,00%	3,485	69,452
-3,521	69,488	-3,150	69,117	-3,00%	0+200,523	PC	9.436.398,008	745.782,221	69,212	69,375	-0,163	3,150	69,117	3,00%	3,485	69,452
-3,251	69,201	-3,150	69,100	-3,00%	0+220,000		9.436.390,393	745.800,145	69,194	69,171	0,023	3,150	69,100	3,00%	3,208	69,158
-3,465	68,871	-3,150	69,082	-3,00%	0+240,000		9.436.383,682	745.818,982	69,176	69,451	-0,275	3,150	69,082	3,00%	3,810	69,741
-4,044	68,467	-3,150	69,064	-3,00%	0+260,000		9.436.378,118	745.838,189	69,158	69,216	-0,058	3,150	69,064	3,00%	3,820	69,733
-4,533	68,123	-3,150	69,046	-3,00%	0+280,000		9.436.373,722	745.857,697	69,140	69,419	-0,279	3,150	69,046	3,00%	3,585	69,480
-4,308	68,260	-3,150	69,032	-3,00%	0+300,000		9.436.370,510	745.877,434	69,127	69,588	-0,462	3,150	69,032	3,00%	3,194	69,076
-4,786	67,937	-3,150	69,028	-3,00%	0+320,000		9.436.368,494	745.897,329	69,122	69,483	-0,361	3,150	69,028	3,00%	3,586	68,737
-3,171	69,048	-3,150	69,028	-3,00%	0+340,000		9.436.367,681	745.917,310	69,122	69,647	-0,525	3,150	69,028	3,00%	3,255	69,133
-3,268	69,146	-3,150	69,028	-3,00%	0+360,000		9.436.368,073	745.937,303	69,122	69,667	-0,545	3,150	69,028	3,00%	3,303	69,180
-3,572	69,449	-3,150	69,028	-3,00%	0+370,817	PT	9.436.368,787	745.948,096	69,122	69,669	-0,547	3,150	69,028	3,00%	4,600	68,061
-3,373	69,250	-3,150	69,028	-3,00%	0+380,000		9.436.369,543	745.957,248	69,122	69,661	-0,539	3,150	69,028	3,00%	3,488	68,802
-3,227	69,105	-3,150	69,028	-3,00%	0+400,000		9.436.371,189	745.977,180	69,122	69,698	-0,576	3,150	69,028	3,00%	3,746	69,623
-3,781	68,607	-3,150	69,028	-3,00%	0+420,000	FIM	9.436.372,836	745.997,112	69,122	69,636	-0,514	3,150	69,028	3,00%	3,868	69,745

ORIGEM DO MATERIAL ESCAVADO			VOLUME (m3)			DIST. DE TRANSP. (km)	MOMENTO TRANSP. (m3xkm)	MOMENTO TRANSP. (TKM)	DESTINO DO MATERIAL ESCAVADO		
CORTE		ESCAVAÇÃO							ATERRO		OBSERVAÇÕES
Nº	km ao km	km ao km	1ª Cat.	2ª Cat.	3ª Cat.				Nº	km ao km	
METRO DE TERESINA											
Corte 1	100+880 a 100+960	100+880 a 100+960	490,19	0,00	0,00	26,21	11.377,31	19.271,82	BF-01	ADME	Bota-Fora - CTR Teresina
Corte 2	100+963 a 101+140	100+963 a 101+140	897,95	0,00	0,00	26,21	20.841,42	35.302,90	BF-02	ADME	Bota-Fora - CTR Teresina
Corte 3	101+160 a 104+520	101+160 a 104+520	28.883,56	0,00	0,00	26,21	670.387,43	1.135.557,16	BF-03	ADME	Bota-Fora - CTR Teresina
Corte 4	104+540 a 104+740	104+540 a 104+740	1.417,30	0,00	0,00	26,21	32.895,53	55.721,15	BF-04	ADME	Bota-Fora - CTR Teresina
Corte 5	104+760 a 105+540	104+760 a 105+540	5.415,89	0,00	0,00	26,21	125.702,81	212.925,72	BF-05	ADME	Bota-Fora - CTR Teresina
Corte 6	105+596 a 106+580	105+596 a 106+580	8.115,06	0,00	0,00	26,21	188.350,54	319.043,58	BF-06	ADME	Bota-Fora - CTR Teresina
Corte 7	106+740 a 106+900	106+740 a 106+900	1.101,08	0,00	0,00	26,21	25.556,07	43.288,96	BF-07	ADME	Bota-Fora - CTR Teresina
Corte 8	106+920 a 109+640	106+920 a 109+640	27.672,00	0,00	0,00	26,21	642.267,12	1.087.924,68	BF-08	ADME	Bota-Fora - CTR Teresina
Corte 9	109+660 a 110+220	109+660 a 110+220	4.140,11	0,00	0,00	26,21	96.091,95	162.768,42	BF-09	ADME	Bota-Fora - CTR Teresina
Corte 10	110+220 a 113+640	110+220 a 113+640	32.284,63	0,00	0,00	26,21	749.326,26	1.269.270,23	BF-10	ADME	Bota-Fora - CTR Teresina
Corte 11	400+000 a 401+160	400+000 a 401+160	26.257,73	0,00	0,00	26,21	609.441,91	1.032.322,65	BF-10	ADME	Bota-Fora - CTR Teresina
Jazida Trincheira	---	---	0,26	0,00	0,00	11,31	2,19	4,48	Aterro 1	100+920 a 100+960	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1.945,58	0,00	0,00	11,31	16.167,80	33.006,83	Aterro 2	100+963 a 101+140	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	931,63	0,00	0,00	11,31	7.741,86	15.805,14	Aterro 3	101+160 a 101+440	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	4.624,04	0,00	0,00	11,31	38.425,81	78.446,91	Aterro 4	101+560 a 102+080	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	0,04	0,00	0,00	11,31	0,30	0,61	Aterro 5	102+082 a 102+100	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1,93	0,00	0,00	11,31	16,05	32,78	Aterro 6	102+142 a 102+200	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	172,03	0,00	0,00	11,31	1.429,59	2.918,52	Aterro 7	102+220 a 102+400	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1.470,73	0,00	0,00	11,31	12.221,78	24.950,97	Aterro 8	102+407 a 103+120	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	6,91	0,00	0,00	11,31	57,44	117,26	Aterro 9	103+380 a 103+440	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	6,50	0,00	0,00	11,31	54,05	110,34	Aterro 10	103+560 a 103+640	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	533,54	0,00	0,00	11,31	4.433,75	9.051,57	Aterro 11	103+820 a 104+220	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	8,14	0,00	0,00	11,31	67,61	138,03	Aterro 12	104+320 a 104+370	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1,73	0,00	0,00	11,31	14,36	29,32	Aterro 13	104+380 a 104+460	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1.075,56	0,00	0,00	11,31	8.937,90	18.246,88	Aterro 14	104+540 a 104+740	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	2.593,85	0,00	0,00	11,31	21.554,88	44.004,63	Aterro 15	104+760 a 105+460	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	11,88	0,00	0,00	11,31	98,72	201,54	Aterro 16	105+480 a 105+540	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	5.970,44	0,00	0,00	11,31	49.614,39	101.288,58	Aterro 17	105+596 a 106+220	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	12.232,44	0,00	0,00	11,31	101.651,58	207.523,34	Aterro 18	106+240 a 106+560	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	28.861,58	0,00	0,00	11,31	239.839,76	489.636,77	Aterro 19	106+740 a 106+900	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	111.590,68	0,00	0,00	11,31	927.318,52	1.893.135,82	Aterro 20	106+940 a 108+380	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	3,12	0,00	0,00	11,31	25,93	52,93	Aterro 21	108+580 a 108+640	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	27,02	0,00	0,00	11,31	224,57	458,46	Aterro 22	108+780 a 108+900	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	594,22	0,00	0,00	11,31	4.937,93	10.080,87	Aterro 23	108+980 a 109+378	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	5.096,70	0,00	0,00	11,31	42.353,58	86.465,52	Aterro 24	109+660 a 110+220	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	2.352,50	0,00	0,00	11,31	19.549,31	39.910,23	Aterro 25	110+220 a 110+680	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	6,29	0,00	0,00	11,31	52,25	106,68	Aterro 26	110+720 a 110+860	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	0,10	0,00	0,00	11,31	0,80	1,63	Aterro 27	110+890 a 110+915	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	309,22	0,00	0,00	11,31	2.569,58	5.245,85	Aterro 28	111+701 a 111+828	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	0,28	0,00	0,00	11,31	2,29	4,68	Aterro 29	112+400 a 112+460	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	448,68	0,00	0,00	11,31	3.728,53	7.611,86	Aterro 30	112+840 a 113+020	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	0,49	0,00	0,00	11,31	4,09	8,35	Aterro 31	113+520 a 113+580	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	20.739,06	0,00	0,00	11,31	172.341,59	351.838,15	Aterro 32	400+000 a 400+300	Empréstimo Jazida Trincheira
Jazida Trincheira	---	---	1.149,58	0,00	0,00	11,31	9.552,98	19.502,56	Aterro 33	401+020 a 401+160	Empréstimo Jazida Trincheira
CV - Camada Vegetal - L1	100+880 a 113+640	100+880 a 113+640	57.959,36	0,00	0,00	26,21	1.345.236,75	2.278.672,24	BF-CV	ADME	Bota-Fora - CTR Teresina

ORIGEM DO MATERIAL ESCAVADO			VOLUME (m3)			DIST. DE TRANSP. (km)	MOMENTO TRANSP. (m3xkm)	MOMENTO TRANSP. (TKM)	DESTINO DO MATERIAL ESCAVADO		
CORTE		ESCAVAÇÃO							ATERRO		OBSERVAÇÕES
Nº	km ao km	km ao km	1ª Cat.	2ª Cat.	3ª Cat.				Nº	km ao km	
METRO DE TERESINA											
CV - Camada Vegetal - L4	400+000 a 401+160	400+000 a 401+160	6.313,18	0,00	0,00	26,21	146.528,91	248.202,67	BF-CV	ADME	Bota-Fora - CTR Teresina
Escalonamento - L1	100+880 a 113+640	100+880 a 113+640	66.612,25	0,00	0,00	0,05			BF-ESC_L1	ADME	Recomposição Escalonamento dos Aterros - L1
Escalonamento - L4	400+000 a 401+160	400+000 a 401+160	13.364,92	0,00	0,00	0,05			BF-ESC_L4	ADME	Recomposição Escalonamento dos Aterros - L4
Jazida Trincheira	---	---	13.322,45	0,00	0,00	0,05			ESC-L1	100+880 a 113+640	Recomposição Escalonamento dos Aterros - L1
Jazida Trincheira	---	---	2.672,98	0,00	0,00	0,05			ESC-L4	400+000 a 401+160	Recomposição Escalonamento dos Aterros - L4
Jazida Minor	---	---	11.094,00	0,00	0,00	48,25	502.003,50	802.928,25	CD	106+960 a 108+260	Colchão Drenante
Solo Saturado	106+960 a 108+260	106+960 a 108+260	12.326,67	0,00	0,00	26,21	286.101,93	484.622,90	BF-SS	ADME	Bota-Fora - CTR Teresina
Jazida Trincheira	---	---	0,00	0,00	0,00	11,31	0,00	0,00	SL	-	Sublastro
Areal Santa Maria	100+880 a 113+640	100+880 a 113+640	0,00	0,00	0,00	17,90	0,00	0,00	CA	-	Camada Anticontaminante
Corte LP	0+000 a 0+420	0+000 a 0+420	829,96	0,00	0,00	26,21	19.263,37	32.629,88	BF-LP	ADME	Bota-Fora - CTR Teresina - Linha Provisória
Jazida Trincheira	---	---	900,47	0,00	0,00	11,31	7.482,89	15.276,44	Aterro LP	0+000 a 0+420	Empréstimo Jazida Trincheira - Linha Provisória
Rebaixo Cortes	400+000 a 401+160	400+000 a 401+160	26.257,73	0,00	0,00	26,21	609.441,91	1.032.322,65	BF-10	ADME	Bota-Fora - CTR Teresina

FERROVIA LINHA 1

ATERRO	ENTRE KM		VOLUME
	INICIAL	FINAL	
Aterro 1	100+920	100+960	0,22
Aterro 2	100+963	101+140	1.621,32
Aterro 3	101+160	101+440	776,36
Aterro 4	101+560	102+080	3.853,37
Aterro 5	102+082	102+100	0,03
Aterro 6	102+142	102+200	1,61
Aterro 7	102+220	102+400	143,36
Aterro 8	102+407	103+120	1.225,61
Aterro 9	103+380	103+440	5,76
Aterro 10	103+560	103+640	5,42
Aterro 11	103+820	104+220	444,62
Aterro 12	104+320	104+370	6,78
Aterro 13	104+380	104+460	1,44
Aterro 14	104+540	104+740	896,30
Aterro 15	104+760	105+460	2.161,54
Aterro 16	105+480	105+540	9,90
Aterro 17	105+596	106+220	4.975,37
Aterro 18	106+240	106+560	10.193,70
Aterro 19	106+740	106+900	24.051,32
Aterro 20	106+940	108+380	92.992,23
Aterro 21	108+580	108+640	2,60
Aterro 22	108+780	108+900	22,52
Aterro 23	108+980	109+378	495,18
Aterro 24	109+660	110+220	4.247,25
Aterro 25	110+220	110+680	1.960,42
Aterro 26	110+720	110+860	5,24
Aterro 27	110+890	110+915	0,08
Aterro 28	111+701	111+828	257,68
Aterro 29	112+400	112+460	0,23
Aterro 30	112+840	113+020	373,90
Aterro 31	113+520	113+580	0,41
TOTAL			**150.731,77**

CORTE	ENTRE KM		VOLUME GEOM. (m³)		
	INICIAL	FINAL	1.Cat	2.Cat	3.Cat
Corte 1	100+880	100+960	490,19	-	-
Corte 2	100+963	101+140	897,95	-	-
Corte 3	101+160	104+520	28.883,56	-	-
Corte 4	104+540	104+740	1.417,30	-	-
Corte 5	104+760	105+540	5.415,89	-	-
Corte 6	105+596	106+580	8.115,06	-	-
Corte 7	106+740	106+900	1.101,08	-	-
Corte 8	106+920	109+640	27.672,00	-	-
Corte 9	109+660	110+220	4.140,11	-	-
Corte 10	110+220	113+640	32.284,63	-	-
TOTAL			**110.417,77**	**-**	**-**

FERROVIA LINHA 4

ATERRO	ENTRE KM		VOLUME
	INICIAL	FINAL	
Aterro 32	400+000	400+300	17.282,55
Aterro 33	401+020	401+160	957,98
TOTAL			**18.240,53**

CORTE	ENTRE KM		VOLUME GEOM. (m³)		
	INICIAL	FINAL	1.Cat	2.Cat	3.Cat
Corte 11	400+000	401+160	26.257,73	-	-
TOTAL			**26.257,73**	**-**	**-**

FERROVIA DESVIO PROVISÓRIO

ATERRO	ENTRE KM		VOLUME
	INICIAL	FINAL	
Aterro 1	00+006	00+100	682,64
Aterro 2	00+201	00+340	66,55
Aterro 3	00+360	00+420	1,20
TOTAL			**750,39**

CORTE	ENTRE KM		VOLUME GEOM. (m³)		
	INICIAL	FINAL	1.Cat	2.Cat	3.Cat
Corte 1	00+006	00+420	829,96	-	-
TOTAL			**829,96**	**-**	**-**

RODOVIA AV. HIGINO CUNHA

ATERRO	ENTRE KM		VOLUME
	INICIAL	FINAL	
Aterro 1	00+020	00+060	18,53
Aterro 2	00+380	00+440	2,73
			21,26

CORTE	ENTRE KM		VOLUME GEOM. (m³)		
	INICIAL	FINAL	1.Cat	2.Cat	3.Cat
Corte 1	00+020	00+440	16.976,37	-	-
			16.976,37	**-**	**-**

CUBAÇÃO - LINHA 01

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)								
100.000,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00		-			-		
					-			-	-													-	0,00		-	0,00
100.020,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.040,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.060,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.080,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.100,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.120,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.140,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.160,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.180,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.200,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.220,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.240,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.260,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.280,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.300,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.320,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.333,40	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.340,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.345,90	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.358,41	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.360,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.380,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.400,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.420,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.440,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.460,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.480,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.500,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.520,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.540,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.560,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.580,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.587,95	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.600,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.620,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.620,61	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.640,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.653,28	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.660,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.680,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9									
					-			-	-													-	0,00		-	0,00
100.700,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.720,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.740,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.760,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.776,30	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.780,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.800,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.820,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.840,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.845,33	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.860,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					-			-	-													-	0,00		-	0,00
100.880,00	-			-						-	-	-	-	-	-	-	-	-	1.000.000,00	-	-			-		
					86,86			-	-													36,48	36,48		-	0,00
100.900,00	8,70			-						86,86	-	-	-	-	72,38	-	-	72,38	1.000.072,38	72,38	3,67			-		
					131,51			-	-													52,84	89,32		-	0,00
100.914,36	9,63			-						218,37	-	-	-	-	181,98	-	-	181,98	1.000.181,98	109,60	3,71			-		
					51,71			-	-													20,92	110,24		-	0,00
100.920,00	8,69			-						270,08	-	-	-	-	225,07	-	-	225,07	1.000.225,07	43,09	3,71			-		
					153,48			0,11	0,11													71,61	181,85		-	0,00
100.940,00	6,66			0,01						423,56	-	-	0,01	0,10	352,97	-	-	352,97	1.000.352,86	127,90	3,45			-		
					66,63			0,11	0,11													34,55	216,40		-	0,00
100.960,00	-			-						490,19	-	-	0,02	0,20	408,49	-	-	408,49	1.000.408,27	55,52	-			-		
					-			-	-													-	216,40		-	0,00
100.963,32	-			-						490,19	-	-	0,02	0,20	408,49	-	-	408,49	1.000.408,27	-	-			-		
					48,02			113,32	40,02													41,24	257,64		126,43	126,43
100.980,00	5,76			13,64						538,21	-	-	15,46	98,08	448,51	-	-	448,51	1.000.334,97	40,02	4,94			15,15		
					114,43			206,02	95,36													90,53	348,17		309,89	436,32
101.000,00	5,71			7,13						652,64	-	-	104,12	215,44	543,87	-	-	543,87	1.000.224,31	95,36	4,14			15,80		
					20,49			24,86	17,08													14,94	363,11		58,28	494,60
101.003,53	5,90			6,96						673,13	-	-	108,27	236,15	560,94	-	-	560,94	1.000.216,52	17,07	4,33			17,22		
					97,20			137,76	81,00													77,22	440,33		285,80	780,40
101.020,00	5,93			10,00						770,33	-	-	149,38	332,80	641,94	-	-	641,94	1.000.159,76	81,00	5,09			17,43		
					111,67			178,49	93,06													100,68	541,01		325,56	1.105,96
101.040,00	5,24			7,98						882,00	-	-	210,51	450,16	735,00	-	-	735,00	1.000.074,33	93,06	4,98			15,08		
					20,11			30,40	16,76													19,00	560,01		56,80	1.162,76
101.043,74	5,51			8,28						902,11	-	-	218,97	472,10	751,76	-	-	751,76	1.000.060,69	16,76	5,17			15,30		
					89,09			157,47	74,24													80,92	640,93		251,53	1.414,29
101.059,59	5,73			11,60						991,20	-	-	283,46	565,08	826,00	-	-	826,00	999.977,46	74,24	5,04			16,45		
					2,36			4,82	1,97													2,08	643,01		6,81	1.421,10
101.060,00	5,65			11,65						993,56	-	-	285,84	567,52	827,97	-	-	827,97	999.974,61	1,97	4,97			16,39		
					56,77			115,99	47,31													50,36	693,37		159,63	1.580,73
101.070,39	5,28			10,80						1.050,33	-	-	340,85	628,50	875,28	-	-	875,28	999.905,93	47,31	4,73			14,28		
					50,20			103,51	41,83													45,29	738,66		138,50	1.719,23
101.080,00	5,19			10,87						1.100,53	-	-	387,98	684,88	917,11	-	-	917,11	999.844,25	41,83	4,71			14,54		
					6,38			13,23	5,32													5,77	744,43		17,53	1.736,76
101.081,20	5,45			11,18						1.106,91	-	-	394,18	691,91	922,42	-	-	922,42	999.836,33	5,31	4,92			14,69		
					106,41			226,30	88,68													96,27	840,70		297,46	2.034,22
101.100,00	5,87			12,89						1.213,32	-	-	510,15	802,24	1.011,10	-	-	1.011,10	999.698,71	88,68	5,33			16,95		
					116,76			219,02	97,30													104,46	945,16		330,32	2.364,54
101.120,00	5,81			9,01						1.330,08	-	-	611,81	919,60	1.108,40	-	-	1.108,40	999.576,99	97,30	5,12			16,08		
					58,06			90,13	48,38													51,21	996,37		160,79	2.525,33
101.140,00	-			-						1.388,14	-	-	611,84	1.009,70	1.156,78	-	-	1.156,78	999.535,24	48,38	-			-		
					-			-	-													-	996,37		-	2.525,33
101.160,00	-			-						1.388,14	-	-	611,84	1.009,70	1.156,78	-	-	1.156,78	999.535,24	-	-			-		
					37,67			12,34	12,34													28,68	1.025,05		174,46	2.699,79
101.180,00	3,77			1,23						1.425,81	-	-	611,88	1.022,00	1.188,18	-	-	1.188,18	999.554,30	31,40	2,87			17,45		
					77,25			39,84	39,84													61,45	1.086,50		313,84	3.013,63
101.200,00	3,96			2,75						1.503,06	-	-	611,92	1.061,80	1.252,55	-	-	1.252,55	999.578,83	64,37	3,28			13,94		
					78,07			59,70	59,70													69,64	1.156,14		255,38	3.269,01
101.220,00	3,85			3,22						1.581,13	-	-	611,92	1.121,50	1.317,61	-	-	1.317,61	999.584,19	65,06	3,69			11,60		
					9,87			8,56	8,23													9,58	1.165,72		29,35	3.298,36
101.222,53	3,96			3,55						1.591,00	-	-	611,93	1.130,05	1.325,83	-	-	1.325,83	999.583,85	8,22	3,89			11,63		
					71,19			88,82	59,33													69,94	1.235,66		205,05	3.503,41
101.240,00	4,06			6,31						1.662,19	-	-	614,61	1.216,19	1.385,16	-	-	1.385,16	999.554,36	59,33	3,98			11,44		
					46,03			72,86	38,36													45,07	1.280,73		127,78	3.631,19
101.250,99	4,16			6,54						1.708,22	-	-	622,98	1.280,68	1.423,52	-	-	1.423,52	999.519,86	38,36	4,06			11,31		
					38,00			64,70	31,67													37,36	1.318,09		96,56	3.727,75
101.260,00	4,10			7,42						1.746,22	-	-	634,81	1.333,55	1.455,18	-	-	1.455,18	999.486,82	31,66	4,06			9,67		
					81,60			162,51	68,00													81,04	1.399,13		161,24	3.888,99
101.279,45	4,12			8,99						1.827,82	-	-	683,17	1.447,70	1.523,18	-	-	1.523,18	999.392,31	68,00	4,11			6,50		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					2,26			4,97	1,88														2,25	1.401,38		3,56	3.892,55
101.280,00	4,13			9,16						1.830,08	-	-	684,93	1.450,91		1.525,07	-	-	1.525,07	999.389,23	1,89	4,11			6,50		
					94,91			101,09	79,09														81,02	1.482,40		202,30	4.094,85
101.300,00	5,36			0,94						1.924,99	-	-	685,02	1.551,91		1.604,16	-	-	1.604,16	999.367,23	79,09	4,00			13,73		
					114,17			12,20	12,20														78,99	1.561,39		266,89	4.361,74
101.320,00	6,06			0,28						2.039,16	-	-	685,02	1.564,11		1.699,30	-	-	1.699,30	999.450,17	95,14	3,90			12,96		
					136,07			3,40	3,40														80,11	1.641,50		262,64	4.624,38
101.340,00	7,55			0,06						2.175,23	-	-	685,02	1.567,51		1.812,69	-	-	1.812,69	999.560,16	113,39	4,11			13,31		
					157,89			7,61	7,61														82,14	1.723,64		133,07	4.757,45
101.360,00	8,24			0,70						2.333,12	-	-	685,03	1.575,11		1.944,27	-	-	1.944,27	999.684,13	131,58	4,11			-		
					10,99			0,96	0,96														5,46	1.729,10		-	4.757,45
101.361,33	8,28			0,74						2.344,11	-	-	685,03	1.576,07		1.953,43	-	-	1.953,43	999.692,33	9,16	4,11			-		
					152,45			23,14	23,14														77,83	1.806,93		-	4.757,45
101.380,00	7,85			1,64						2.496,56	-	-	685,95	1.598,29		2.080,47	-	-	2.080,47	999.796,23	127,04	4,08			-		
					148,42			48,98	48,98														80,62	1.887,55		-	4.757,45
101.400,00	6,85			3,10						2.644,98	-	-	687,53	1.645,69		2.204,15	-	-	2.204,15	999.870,93	123,68	3,85			-		
					25,72			10,17	10,17														14,54	1.902,09		-	4.757,45
101.403,69	7,09			2,41						2.670,70	-	-	687,54	1.655,85		2.225,58	-	-	2.225,58	999.882,19	21,43	4,03			-		
					110,37			35,67	35,67														64,07	1.966,16		-	4.757,45
101.420,00	6,35			1,84						2.781,07	-	-	688,55	1.690,51		2.317,56	-	-	2.317,56	999.938,50	91,98	3,73			-		
					132,23			18,84	18,84														72,23	2.038,39		-	4.757,45
101.440,00	6,81			-						2.913,30	-	-	688,99	1.708,91		2.427,75	-	-	2.427,75	1.000.029,85	110,19	3,43			-		
					45,82			-	-														21,08	2.059,47		-	4.757,45
101.446,05	8,25			-						2.959,12	-	-	688,99	1.708,91		2.465,93	-	-	2.465,93	1.000.068,03	38,18	3,48			-		
					39,85			-	-														15,97	2.075,44		-	4.757,45
101.450,72	8,83			-						2.998,97	-	-	688,99	1.708,91		2.499,14	-	-	2.499,14	1.000.101,24	33,21	3,36			-		
					84,04			-	-														30,90	2.106,34		-	4.757,45
101.460,00	9,13			-						3.083,01	-	-	688,99	1.708,91		2.569,18	-	-	2.569,18	1.000.171,28	70,04	3,24			-		
					146,15			-	-														56,32	2.162,66		-	4.757,45
101.476,87	8,05			-						3.229,16	-	-	688,99	1.708,91		2.690,97	-	-	2.690,97	1.000.293,07	121,79	3,38			-		
					25,78			-	-														10,44	2.173,10		-	4.757,45
101.480,00	8,39			-						3.254,94	-	-	688,99	1.708,91		2.712,45	-	-	2.712,45	1.000.314,55	21,48	3,29			-		
					171,65			-	-														69,34	2.242,44		-	4.757,45
101.500,00	8,62			-						3.426,59	-	-	688,99	1.708,91		2.855,49	-	-	2.855,49	1.000.457,59	143,04	3,58			-		
					26,09			-	-														10,74	2.253,18		-	4.757,45
101.503,01	8,70			-						3.452,68	-	-	688,99	1.708,91		2.877,23	-	-	2.877,23	1.000.479,33	21,74	3,55			-		
					149,22			-	-														58,37	2.311,55		-	4.757,45
101.520,00	8,86			-						3.601,90	-	-	688,99	1.708,91		3.001,58	-	-	3.001,58	1.000.603,68	124,35	3,33			-		
					55,06			-	-														20,66	2.332,21		-	4.757,45
101.526,01	9,45			-						3.656,96	-	-	688,99	1.708,91		3.047,47	-	-	3.047,47	1.000.649,57	45,89	3,55			-		
					132,99			-	-														49,47	2.381,68		-	4.757,45
101.540,00	9,41			-						3.789,95	-	-	688,99	1.708,91		3.158,29	-	-	3.158,29	1.000.760,39	110,82	3,48			-		
					173,16			-	-														69,22	2.450,90		-	4.757,45
101.560,00	7,76			-						3.963,11	-	-	688,99	1.708,91		3.302,59	-	-	3.302,59	1.000.904,69	144,30	3,40			-		
					139,98			3,13	3,13														69,83	2.520,73		-	4.757,45
101.580,00	6,11			0,31						4.103,09	-	-	689,02	1.712,01		3.419,24	-	-	3.419,24	1.001.018,21	116,65	3,54			-		
					114,29			15,15	15,15														72,75	2.593,48		-	4.757,45
101.600,00	5,21			1,20						4.217,38	-	-	689,07	1.727,11		3.514,48	-	-	3.514,48	1.001.098,30	95,24	3,69			-		
					68,00			20,46	20,46														48,28	2.641,76		-	4.757,45
101.612,72	5,39			2,00						4.285,38	-	-	689,18	1.747,46		3.571,15	-	-	3.571,15	1.001.134,51	56,67	3,86			-		
					38,49			12,34	12,34														28,23	2.669,99		-	4.757,45
101.620,00	5,09			1,36						4.323,87	-	-	689,28	1.759,70		3.603,22	-	-	3.603,22	1.001.154,24	32,07	3,85			-		
					92,24			26,92	26,92														74,99	2.744,98		-	4.757,45
101.640,00	4,08			1,32						4.416,11	-	-	689,40	1.786,50		3.680,09	-	-	3.680,09	1.001.204,19	76,87	3,62			-		
					77,44			39,67	39,67														72,45	2.817,43		-	4.757,45
101.660,00	3,63			2,64						4.493,55	-	-	689,47	1.826,10		3.744,63	-	-	3.744,63	1.001.229,06	64,54	3,60			-		
					74,61			56,14	56,14														74,27	2.891,70		-	4.757,45
101.680,00	3,80			2,96						4.568,16	-	-	689,61	1.882,10		3.806,80	-	-	3.806,80	1.001.235,09	62,17	3,80			-		
					74,19			73,68	61,83														74,18	2.965,88		-	4.757,45
101.699,42	3,81			4,61						4.642,35	-	-	689,80	1.955,59		3.868,63	-	-	3.868,63	1.001.223,24	61,83	3,81			-		
					2,22			2,69	1,85														2,22	2.968,10		-	4.757,45
101.700,00	3,81			4,61						4.644,57	-	-	689,80	1.958,28		3.870,48	-	-	3.870,48	1.001.222,40	1,85	3,81			-		
					75,82			94,75	63,18														74,23	3.042,33		-	4.757,45
101.720,00	3,77			4,87						4.720,39	-	-	689,75	2.053,08		3.933,66	-	-	3.933,66	1.001.190,83	63,18	3,61			-		
					75,82			123,18	63,18														74,23	3.116,56		-	4.757,45
101.740,00	3,81			7,45						4.796,21	-	-	695,57	2.170,44		3.996,84	-	-	3.996,84	1.001.130,83	63,18	3,81			-		
					78,25			157,95	65,21														78,25	3.194,81		-	4.757,45
101.760,00	4,01			8,34						4.874,46	-	-	736,16	2.287,80		4.062,05	-	-	4.062,05	1.001.038,09	65,21	4,01			-		
					80,25			192,30	66,88														80,25	3.275,06		-	4.757,45
101.780,00	4,01			10,89						4.954,71	-	-	811,10	2.405,16		4.128,92	-	-	4.128,92	1.000.912,66	66,87	4,01			-		
					82,26			239,69	68,55														82,26	3.357,32		-	4.757,45
101.800,00	4,21			13,08						5.036,97	-	-	933,43	2.522,52		4.197,48	-	-	4.197,48	1.000.741,53	68,56	4,21			-		
					80,25			246,51	66,88														80,25	3.437,57		-	4.757,45
101.820,00	3,81			11,57						5.117,22	-	-	1.062,58	2.639,88		4.264,35	-	-	4.264,35	1.000.561,89	66,87	3,81			-		
					82,26			264,31	68,55														82,26	3.519,83		-	4.757,45
101.840,00	4,41			14,86						5.199,48	-	-	1.209,53	2.757,24		4.332,90	-	-	4.332,90	1.000.366,13	68,55	4,41			-		
					79,07			297,24	65,89														79,07	3.598,90		-	4.757,45
101.857,91	4,41			18,32						5.278,55	-	-	1.401,65	2.862,36		4.398,79	-	-	4.398,79	1.000.134,78	65,89	4,41			-		
					9,21			38,02	7,68														9,21	3.608,11		-	4.757,45
101.860,00	4,41			18,13						5.287,76	-	-	1.427,43	2.874,60		4.406,47	-	-	4.406,47	1.000.104,44	7,68	4,41			-		
					35,53			145,43	29,61														35,53	3.643,64		-	4.757,45
101.868,23	4,22			17,19						5.323,29	-	-	1.524,55	2.922,91		4.436,08	-	-	4.436,08	999.988,62	29,61	4,22			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)							
					43,94			173,08	36,62													43,51	3.687,15		-	4.757,45
101.878,56	4,30			16,35						5.367,23	-	-	1.637,06	2.983,48	4.472,69	-	-	4.472,69	999.852,15	36,61	4,22					
					6,28			23,51	5,23													6,09	3.693,24		-	4.757,45
101.880,00	4,39			16,19						5.373,51	-	-	1.652,09	2.991,96	4.477,92	-	-	4.477,92	999.833,87	5,23	4,22					
					111,13			316,11	92,61													86,35	3.779,59		-	4.757,45
101.900,00	6,72			15,42						5.484,64	-	-	1.850,84	3.109,32	4.570,53	-	-	4.570,53	999.610,37	92,61	4,42					
					44,33			98,84	36,94													28,75	3.808,34		-	4.757,45
101.906,36	7,21			15,65						5.528,97	-	-	1.912,35	3.146,65	4.607,48	-	-	4.607,48	999.548,48	36,95	4,62					
					72,95			163,08	60,79													47,66	3.856,00		-	4.757,45
101.916,68	6,92			15,96						5.601,92	-	-	2.014,87	3.207,21	4.668,27	-	-	4.668,27	999.446,19	60,79	4,62					
					22,78			52,34	18,98													15,31	3.871,31		-	4.757,45
101.920,00	6,81			15,60						5.624,70	-	-	2.047,74	3.226,68	4.687,25	-	-	4.687,25	999.412,83	18,98	4,62					
					45,95			106,88	38,29													31,62	3.902,93		-	4.757,45
101.927,00	6,31			14,92						5.670,65	-	-	2.113,53	3.267,77	4.725,54	-	-	4.725,54	999.344,24	38,29	4,41					
					78,11			190,83	65,09													58,41	3.961,34		-	4.757,45
101.940,00	5,71			14,44						5.748,76	-	-	2.228,09	3.344,04	4.790,63	-	-	4.790,63	999.218,50	65,09	4,57					
					137,99			248,11	114,99													90,77	4.052,11		-	4.757,45
101.960,00	8,09			10,37						5.886,75	-	-	2.358,84	3.461,40	4.905,62	-	-	4.905,62	999.085,38	114,99	4,50					
					194,84			175,73	162,37													91,18	4.143,29		-	4.757,45
101.980,00	11,39			7,20						6.081,59	-	-	2.417,21	3.578,76	5.067,99	-	-	5.067,99	999.072,02	162,37	4,61					
					228,06			124,89	124,89													89,64	4.232,93		-	4.757,45
102.000,00	11,41			5,28						6.309,65	-	-	2.424,74	3.696,12	5.258,04	-	-	5.258,04	999.137,18	190,05	4,35					
					254,64			81,95	81,95													91,65	4.324,58		-	4.757,45
102.020,00	14,05			2,91						6.564,29	-	-	2.424,79	3.778,02	5.470,24	-	-	5.470,24	999.267,43	212,20	4,82					
					271,62			37,32	37,32													95,75	4.420,33		-	4.757,45
102.040,00	13,11			0,82						6.835,91	-	-	2.424,81	3.815,32	5.696,59	-	-	5.696,59	999.456,46	226,35	4,76					
					199,02			10,11	10,11													83,72	4.504,05		-	4.757,45
102.060,00	6,79			0,19						7.034,93	-	-	2.424,82	3.825,42	5.862,44	-	-	5.862,44	999.612,20	165,85	3,61					
					39,24			0,71	0,71													19,73	4.523,78		-	4.757,45
102.065,46	7,57			0,07						7.074,17	-	-	2.424,82	3.826,13	5.895,14	-	-	5.895,14	999.644,19	32,70	3,61					
					59,54			0,31	0,31													29,19	4.552,97		-	4.757,45
102.073,78	6,75			-						7.133,71	-	-	2.424,84	3.826,42	5.944,76	-	-	5.944,76	999.693,50	49,62	3,41					
					43,62			0,01	0,01													21,22	4.574,19		-	4.757,45
102.080,00	7,27			-						7.177,33	-	-	2.424,85	3.826,42	5.981,11	-	-	5.981,11	999.729,84	36,35	3,41					
					15,39			-	-													7,12	4.581,31		-	4.757,45
102.082,09	7,46			-						7.192,72	-	-	2.424,85	3.826,42	5.993,93	-	-	5.993,93	999.742,66	12,82	3,41					
					141,82			0,03	0,03													61,05	4.642,36		-	4.757,45
102.100,00	8,38			-						7.334,54	-	-	2.424,88	3.826,42	6.112,12	-	-	6.112,12	999.860,82	118,19	3,41					
					120,87			-	-													51,83	4.694,19		-	4.757,45
102.115,30	7,43			-						7.455,41	-	-	2.424,88	3.826,42	6.212,84	-	-	6.212,84	999.961,54	100,72	3,37					
					36,12			-	-													15,94	4.710,13		-	4.757,45
102.120,00	7,93			-						7.491,53	-	-	2.424,88	3.826,42	6.242,94	-	-	6.242,94	999.991,64	30,10	3,41					
					70,02			-	-													29,03	4.739,16		-	4.757,45
102.128,54	8,47			-						7.561,55	-	-	2.424,88	3.826,42	6.301,29	-	-	6.301,29	1.000.049,99	58,35	3,39					
					98,97			-	-													38,45	4.777,61		-	4.757,45
102.140,00	8,80			-						7.660,52	-	-	2.424,88	3.826,42	6.383,77	-	-	6.383,77	1.000.132,47	82,48	3,32					
					15,74			-	-													6,00	4.783,61		-	4.757,45
102.141,78	8,86			-						7.676,26	-	-	2.424,88	3.826,42	6.396,88	-	-	6.396,88	1.000.145,58	13,11	3,41					
					154,95			0,65	0,65													62,18	4.845,79		-	4.757,45
102.160,00	8,15			0,07						7.831,21	-	-	2.424,89	3.827,06	6.526,01	-	-	6.526,01	1.000.274,06	129,13	3,41					
					147,95			0,83	0,83													68,27	4.914,06		-	4.757,45
102.180,00	6,64			0,01						7.979,16	-	-	2.424,92	3.827,86	6.649,30	-	-	6.649,30	1.000.396,52	123,29	3,41					
					153,34			0,13	0,13													70,28	4.984,34		-	4.757,45
102.200,00	8,69			-						8.132,50	-	-	2.424,95	3.827,96	6.777,08	-	-	6.777,08	1.000.524,17	127,78	3,61					
					140,35			-	-													72,15	5.056,49		-	4.757,45
102.220,00	5,34			-						8.272,85	-	-	2.424,95	3.827,96	6.894,04	-	-	6.894,04	1.000.641,13	116,96	3,60					
					97,99			6,32	6,32													70,14	5.126,63		-	4.757,45
102.240,00	4,46			0,63						8.370,84	-	-	2.424,97	3.834,26	6.975,70	-	-	6.975,70	1.000.716,47	81,66	3,41					
					84,56			17,92	17,92													68,27	5.194,90		-	4.757,45
102.260,00	4,00			1,16						8.455,40	-	-	2.424,99	3.852,16	7.046,17	-	-	7.046,17	1.000.769,02	70,47	3,41					
					81,67			25,24	25,24													71,01	5.265,91		-	4.757,45
102.280,00	4,17			1,36						8.537,07	-	-	2.425,03	3.877,36	7.114,22	-	-	7.114,22	1.000.811,83	68,05	3,69					
					85,50			26,34	26,34													73,01	5.338,92		-	4.757,45
102.300,00	4,38			1,27						8.622,57	-	-	2.425,07	3.903,66	7.185,48	-	-	7.185,48	1.000.856,75	71,26	3,61					
					124,01			12,86	12,86													72,29	5.411,21		-	4.757,45
102.320,00	8,02			0,02						8.746,58	-	-	2.425,03	3.916,56	7.288,82	-	-	7.288,82	1.000.947,23	103,34	3,61					
					118,36			14,89	14,89													70,28	5.481,49		-	4.757,45
102.340,00	3,81			1,47						8.864,94	-	-	2.425,02	3.931,46	7.387,45	-	-	7.387,45	1.001.030,97	98,63	3,41					
					32,01			10,94	10,94													28,08	5.509,57		-	4.757,45
102.348,23	3,97			1,19						8.896,95	-	-	2.425,02	3.942,40	7.414,13	-	-	7.414,13	1.001.046,71	26,68	3,41					
					49,95			11,94	11,94													41,36	5.550,93		-	4.757,45
102.360,00	4,52			0,84						8.946,90	-	-	2.425,01	3.954,35	7.455,75	-	-	7.455,75	1.001.076,39	41,62	3,61					
					87,44			11,30	11,30													62,16	5.613,09		-	4.757,45
102.377,38	5,55			0,46						9.034,34	-	-	2.425,02	3.965,64	7.528,62	-	-	7.528,62	1.001.137,96	72,87	3,54					
					15,41			1,18	1,18													9,39	5.622,48		-	4.757,45
102.380,00	6,20			0,44						9.049,75	-	-	2.425,02	3.966,82	7.541,46	-	-	7.541,46	1.001.149,62	12,84	3,61					
					130,62			4,43	4,43													68,84	5.691,32		-	4.757,45
102.400,00	6,86			-						9.180,37	-	-	2.425,05	3.971,22	7.650,31	-	-	7.650,31	1.001.254,04	108,85	3,27					
					47,53			-	-													21,80	5.713,12		-	4.757,45
102.406,52	7,71			-						9.227,90	-	-	2.425,05	3.971,22	7.689,92	-	-	7.689,92	1.001.293,65	39,61	3,41					
					83,07			1,71	1,71													45,98	5.759,10		-	4.757,45
102.420,00	4,62			0,25						9.310,97	-	-	2.425,07	3.972,91	7.759,14	-	-	7.759,14	1.001.361,16	69,22	3,41					

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					89,32			2,65	2,65														68,24	5.827,34		-	4.757,45
102.440,00	4,31			0,01						9.400,29	-	-	2.425,12	3.975,51		7.833,58	-	-	7.833,58	1.001.432,95	74,44	3,41					
					87,27			0,81	0,81														68,24	5.895,58		-	4.757,45
102.460,00	4,42			0,07						9.487,56	-	-	2.425,13	3.976,31		7.906,30	-	-	7.906,30	1.001.504,86	72,72	3,41					
					79,13			10,49	10,49														68,24	5.963,82		-	4.757,45
102.480,00	3,50			0,98						9.566,69	-	-	2.425,12	3.986,81		7.972,24	-	-	7.972,24	1.001.560,31	65,94	3,41					
					67,12			26,81	26,81														66,26	6.030,08		-	4.757,45
102.500,00	3,21			1,70						9.633,81	-	-	2.425,13	4.013,61		8.028,18	-	-	8.028,18	1.001.589,44	55,94	3,21					
					66,26			39,26	39,26														66,26	6.096,34		-	4.757,45
102.520,00	3,41			2,22						9.700,07	-	-	2.425,19	4.052,81		8.083,39	-	-	8.083,39	1.001.605,39	55,21	3,41					
					68,24			51,30	51,30														68,24	6.164,58		-	4.757,45
102.540,00	3,41			2,91						9.768,31	-	-	2.425,19	4.104,11		8.140,26	-	-	8.140,26	1.001.610,96	56,87	3,41					
					70,24			56,03	56,03														70,24	6.234,82		-	4.757,45
102.560,00	3,61			2,70						9.838,55	-	-	2.425,12	4.160,21		8.198,79	-	-	8.198,79	1.001.613,46	58,53	3,61					
					21,88			17,79	17,79														21,88	6.256,70		-	4.757,45
102.566,23	3,41			3,01						9.860,43	-	-	2.425,12	4.178,00		8.217,03	-	-	8.217,03	1.001.613,91	18,24	3,41					
					46,97			39,26	39,14														46,97	6.303,67		-	4.757,45
102.580,00	3,41			2,69						9.907,40	-	-	2.425,14	4.217,24		8.256,17	-	-	8.256,17	1.001.613,79	39,14	3,41					
					60,01			50,02	50,01														60,01	6.363,68		-	4.757,45
102.597,09	3,61			3,16						9.967,41	-	-	2.425,18	4.267,22		8.306,18	-	-	8.306,18	1.001.613,78	50,01	3,61					
					10,51			9,26	8,76														10,51	6.374,19		-	4.757,45
102.600,00	3,61			3,20						9.977,92	-	-	2.425,18	4.276,48		8.314,93	-	-	8.314,93	1.001.613,27	8,75	3,61					
					72,22			64,26	60,18														72,22	6.446,41		-	4.757,45
102.620,00	3,61			3,23						10.050,14	-	-	2.425,14	4.340,78		8.375,12	-	-	8.375,12	1.001.609,20	60,19	3,61					
					28,69			25,56	23,91														28,69	6.475,10		-	4.757,45
102.627,95	3,61			3,20						10.078,83	-	-	2.425,15	4.366,33		8.399,02	-	-	8.399,02	1.001.607,54	23,90	3,61					
					42,47			36,21	35,39														42,47	6.517,57		-	4.757,45
102.640,00	3,44			2,81						10.121,30	-	-	2.425,14	4.402,55		8.434,42	-	-	8.434,42	1.001.606,73	35,40	3,44					
					69,45			51,89	51,89														69,45	6.587,02		-	4.757,45
102.660,00	3,51			2,38						10.190,75	-	-	2.425,13	4.454,45		8.492,29	-	-	8.492,29	1.001.612,71	57,87	3,51					
					71,08			46,22	46,22														69,18	6.656,20		-	4.757,45
102.680,00	3,60			2,24						10.261,83	-	-	2.425,15	4.500,65		8.551,52	-	-	8.551,52	1.001.625,72	59,23	3,41					
					71,30			33,44	33,44														68,86	6.725,06		-	4.757,45
102.700,00	3,53			1,10						10.333,13	-	-	2.425,19	4.534,05		8.610,94	-	-	8.610,94	1.001.651,70	59,42	3,48					
					69,78			25,27	25,27														68,86	6.793,92		-	4.757,45
102.720,00	3,45			1,42						10.402,91	-	-	2.425,26	4.559,25		8.669,09	-	-	8.669,09	1.001.684,58	58,15	3,41					
					70,59			29,99	29,99														70,21	6.864,13		-	4.757,45
102.740,00	3,61			1,58						10.473,50	-	-	2.425,25	4.589,25		8.727,92	-	-	8.727,92	1.001.713,42	58,83	3,61					
					70,21			41,96	41,96														70,21	6.934,34		-	4.757,45
102.760,00	3,41			2,62						10.543,71	-	-	2.425,21	4.631,25		8.786,42	-	-	8.786,42	1.001.729,96	58,50	3,41					
					68,83			50,49	50,49														68,20	7.002,54		-	4.757,45
102.780,00	3,47			2,43						10.612,54	-	-	2.425,20	4.681,75		8.843,78	-	-	8.843,78	1.001.736,83	57,36	3,41					
					69,71			46,11	46,11														68,20	7.070,74		-	4.757,45
102.800,00	3,50			2,18						10.682,25	-	-	2.425,21	4.727,85		8.901,88	-	-	8.901,88	1.001.748,82	58,10	3,41					
					75,07			39,98	39,98														70,21	7.140,95		-	4.757,45
102.820,00	4,01			1,82						10.757,32	-	-	2.425,19	4.767,85		8.964,43	-	-	8.964,43	1.001.771,39	62,55	3,61					
					78,23			36,49	36,49														71,53	7.212,48		-	4.757,45
102.840,00	3,81			1,83						10.835,55	-	-	2.425,18	4.804,35		9.029,62	-	-	9.029,62	1.001.800,09	65,19	3,54					
					95,23			41,52	41,52														75,54	7.288,02		-	4.757,45
102.860,00	5,71			2,32						10.930,78	-	-	2.425,20	4.845,85		9.108,98	-	-	9.108,98	1.001.837,93	79,36	4,01					
					89,18			42,81	42,81														72,21	7.360,23		-	4.757,45
102.880,00	3,21			1,96						11.019,96	-	-	2.425,21	4.888,65		9.183,30	-	-	9.183,30	1.001.869,44	74,32	3,21					
					66,23			33,97	33,97														66,20	7.426,43		-	4.757,45
102.900,00	3,41			1,43						11.086,19	-	-	2.425,28	4.922,55		9.238,49	-	-	9.238,49	1.001.890,66	55,19	3,41					
					22,46			10,75	10,75														22,45	7.448,88		-	4.757,45
102.906,58	3,41			1,83						11.108,65	-	-	2.425,30	4.933,28		9.257,21	-	-	9.257,21	1.001.898,63	18,72	3,41					
					46,20			25,42	25,42														45,92	7.494,80		-	4.757,45
102.920,00	3,46			1,95						11.154,85	-	-	2.425,36	4.958,64		9.295,71	-	-	9.295,71	1.001.911,71	38,50	3,42					
					69,12			41,61	41,61														68,70	7.563,50		-	4.757,45
102.940,00	3,43			2,20						11.223,97	-	-	2.425,47	5.000,14		9.353,31	-	-	9.353,31	1.001.927,70	57,60	3,43					
					33,03			22,27	22,27														33,03	7.596,53		-	4.757,45
102.949,34	3,64			2,57						11.257,00	-	-	2.425,47	5.022,41		9.380,83	-	-	9.380,83	1.001.932,95	27,52	3,64					
					38,58			25,35	25,35														38,58	7.635,11		-	4.757,45
102.960,00	3,58			2,18						11.295,58	-	-	2.425,50	5.047,73		9.412,98	-	-	9.412,98	1.001.939,75	32,15	3,58					
					70,68			38,97	38,97														70,68	7.705,79		-	4.757,45
102.980,00	3,47			1,71						11.366,26	-	-	2.425,57	5.086,63		9.471,88	-	-	9.471,88	1.001.959,68	58,90	3,47					
					42,34			22,18	22,18														42,33	7.748,12		-	4.757,45
102.992,10	3,51			1,94						11.408,60	-	-	2.425,67	5.108,71		9.507,17	-	-	9.507,17	1.001.972,79	35,29	3,51					
					25,71			12,92	12,92														25,71	7.773,83		-	4.757,45
102.999,45	3,49			1,57						11.434,31	-	-	2.425,69	5.121,61		9.528,59	-	-	9.528,59	1.001.981,29	21,42	3,49					
					1,93			0,89	0,89														1,93	7.775,76		-	4.757,45
103.000,00	3,49			1,64						11.436,24	-	-	2.425,69	5.122,50		9.530,20	-	-	9.530,20	1.001.982,01	1,61	3,49					
					71,20			30,86	30,86														70,32	7.846,08		-	4.757,45
103.020,00	3,61			1,44						11.507,44	-	-	2.425,75	5.153,30		9.589,53	-	-	9.589,53	1.002.010,48	59,33	3,52					
					71,79			19,68	19,68														69,44	7.915,52		-	4.757,45
103.040,00	3,55			0,52						11.579,23	-	-	2.425,83	5.172,90		9.649,36	-	-	9.649,36	1.002.050,63	59,83	3,40					
					71,15			10,16	10,16														68,11	7.983,63		-	4.757,45
103.060,00	3,54			0,49						11.650,38	-	-	2.425,89	5.183,00		9.708,65	-	-	9.708,65	1.002.099,76	59,29	3,39					
					56,86			7,01	7,01														52,14	8.035,77		-	4.757,45
103.074,80	4,11			0,45						11.707,24	-	-	2.425,95	5.189,95		9.756,03	-	-	9.756,03	1.002.140,13	47,38	3,63					
					20,96			2,00	2,00														18,66	8.054,43		-	4.757,45
103.080,00	3,95			0,32						11.728,20	-	-	2.425,95	5.191,95		9.773,50	-	-	9.773,50	1.002.155,60	17,47	3,54					

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					86,80			3,58	3,58														71,44	8.125,87		-	4.757,45
103.100,00	4,69			0,04						11.815,00	-	-	2.425,93	5.195,55		9.845,83	-	-	9.845,83	1.002.224,35	72,33	3,57					
					100,26			0,40	0,40														70,20	8.196,07		-	4.757,45
103.120,00	5,29			-						11.915,26	-	-	2.425,93	5.195,95		9.929,38	-	-	9.929,38	1.002.307,50	83,55	3,42					
					109,13			-	-														68,67	8.264,74		-	4.757,45
103.140,00	5,58			-						12.024,39	-	-	2.425,93	5.195,95		10.020,33	-	-	10.020,33	1.002.398,45	90,95	3,42					
					56,71			-	-														34,78	8.299,52		-	4.757,45
103.150,15	5,56			-						12.081,10	-	-	2.425,93	5.195,95		10.067,58	-	-	10.067,58	1.002.445,70	47,25	3,41					
					28,73			-	-														18,04	8.317,56		-	4.757,45
103.155,35	5,49			-						12.109,83	-	-	2.425,93	5.195,95		10.091,52	-	-	10.091,52	1.002.469,64	23,94	3,53					
					26,12			-	-														16,29	8.333,85		-	4.757,45
103.160,00	5,73			-						12.135,95	-	-	2.425,93	5.195,95		10.113,29	-	-	10.113,29	1.002.491,41	21,77	3,47					
					117,96			-	-														70,63	8.404,48		-	4.757,45
103.180,00	6,03			-						12.253,91	-	-	2.425,93	5.195,95		10.211,59	-	-	10.211,59	1.002.589,71	98,30	3,58					
					124,05			-	-														72,19	8.476,67		-	4.757,45
103.200,00	6,34			-						12.377,96	-	-	2.425,93	5.195,95		10.314,97	-	-	10.314,97	1.002.693,09	103,38	3,62					
					130,57			-	-														72,43	8.549,10		-	4.757,45
103.220,00	6,68			-						12.508,53	-	-	2.425,93	5.195,95		10.423,78	-	-	10.423,78	1.002.801,90	108,81	3,60					
					128,26			-	-														71,51	8.620,61		-	4.757,45
103.240,00	6,11			-						12.636,79	-	-	2.425,93	5.195,95		10.530,66	-	-	10.530,66	1.002.908,78	106,88	3,53					
					115,72			-	-														71,16	8.691,77		-	4.757,45
103.260,00	5,43			-						12.752,51	-	-	2.425,93	5.195,95		10.627,09	-	-	10.627,09	1.003.005,21	96,43	3,56					
					23,58			-	-														15,45	8.707,22		-	4.757,45
103.264,37	5,37			-						12.776,09	-	-	2.425,93	5.195,95		10.646,74	-	-	10.646,74	1.003.024,86	19,65	3,51					
					92,65			-	-														55,11	8.762,33		-	4.757,45
103.280,00	6,45			-						12.868,74	-	-	2.425,93	5.195,95		10.723,95	-	-	10.723,95	1.003.102,07	77,21	3,52					
					135,63			-	-														70,81	8.833,14		-	4.757,45
103.300,00	7,07			-						13.004,37	-	-	2.425,93	5.195,95		10.836,98	-	-	10.836,98	1.003.215,10	113,03	3,54					
					142,24			-	-														71,00	8.904,14		-	4.757,45
103.320,00	7,11			-						13.146,61	-	-	2.425,93	5.195,95		10.955,51	-	-	10.955,51	1.003.333,63	118,53	3,54					
					135,43			-	-														69,52	8.973,66		-	4.757,45
103.340,00	6,39			-						13.282,04	-	-	2.425,93	5.195,95		11.068,37	-	-	11.068,37	1.003.446,49	112,86	3,39					
					142,09			-	-														69,55	9.043,21		-	4.757,45
103.360,00	7,77			-						13.424,13	-	-	2.425,93	5.195,95		11.186,78	-	-	11.186,78	1.003.564,90	118,41	3,54					
					110,65			-	-														47,55	9.090,76		-	4.757,45
103.373,39	8,70			-						13.534,78	-	-	2.425,93	5.195,95		11.278,98	-	-	11.278,98	1.003.657,10	92,20	3,54					
					53,62			-	-														22,00	9.112,76		-	4.757,45
103.379,48	8,91			-						13.588,40	-	-	2.425,93	5.195,95		11.323,67	-	-	11.323,67	1.003.701,79	44,69	3,68					
					4,68			-	-														1,92	9.114,68		-	4.757,45
103.380,00	9,03			-						13.593,08	-	-	2.425,93	5.195,95		11.327,57	-	-	11.327,57	1.003.705,69	3,90	3,68					
					199,70			2,12	2,12														74,12	9.188,80		-	4.757,45
103.400,00	10,87			0,21						13.792,78	-	-	2.425,95	5.198,05		11.493,98	-	-	11.493,98	1.003.869,98	166,41	3,70					
					163,95			2,67	2,67														57,98	9.246,78		-	4.757,45
103.415,91	9,67			0,12						13.956,73	-	-	2.425,99	5.200,68		11.630,61	-	-	11.630,61	1.004.003,94	136,63	3,57					
					40,06			0,37	0,37														14,71	9.261,49		-	4.757,45
103.420,00	9,90			0,06						13.996,79	-	-	2.425,99	5.201,05		11.663,99	-	-	11.663,99	1.004.036,95	33,38	3,62					
					221,21			0,60	0,60														73,85	9.335,34		-	4.757,45
103.440,00	12,11			-						14.218,00	-	-	2.425,99	5.201,65		11.848,33	-	-	11.848,33	1.004.220,69	184,34	3,74					
					151,73			-	-														46,96	9.382,30		-	4.757,45
103.452,33	12,37			-						14.369,73	-	-	2.425,99	5.201,65		11.974,78	-	-	11.974,78	1.004.347,14	126,45	3,84					
					96,72			-	-														29,32	9.411,62		-	4.757,45
103.460,00	12,86			-						14.466,45	-	-	2.425,99	5.201,65		12.055,38	-	-	12.055,38	1.004.427,74	80,60	3,80					
					222,21			-	-														65,65	9.477,27		-	4.757,45
103.476,73	13,71			-						14.688,66	-	-	2.425,99	5.201,65		12.240,55	-	-	12.240,55	1.004.612,91	185,17	4,04					
					45,64			-	-														13,24	9.490,51		-	4.757,45
103.480,00	14,21			-						14.734,30	-	-	2.425,99	5.201,65		12.278,58	-	-	12.278,58	1.004.650,94	38,03	4,05					
					114,35			-	-														32,26	9.522,77		-	4.757,45
103.487,82	15,05			-						14.848,65	-	-	2.425,99	5.201,65		12.373,88	-	-	12.373,88	1.004.746,24	95,30	4,20					
					170,40			-	-														45,44	9.568,21		-	4.757,45
103.498,90	15,69			-						15.019,05	-	-	2.425,99	5.201,65		12.515,88	-	-	12.515,88	1.004.888,24	142,00	4,00					
					16,79			-	-														4,53	9.572,74		-	4.757,45
103.500,00	14,81			-						15.035,84	-	-	2.425,99	5.201,65		12.529,87	-	-	12.529,87	1.004.902,23	13,99	4,23					
					311,69			-	-														85,92	9.658,66		-	4.757,45
103.520,00	16,36			-						15.347,53	-	-	2.425,99	5.201,65		12.789,61	-	-	12.789,61	1.005.161,97	259,74	4,36					
					326,44			-	-														86,28	9.744,94		-	4.757,45
103.540,00	16,28			-						15.673,97	-	-	2.425,99	5.201,65		13.061,64	-	-	13.061,64	1.005.434,00	272,03	4,27					
					336,30			-	-														86,28	9.831,22		-	4.757,45
103.560,00	17,35			-						16.010,27	-	-	2.425,99	5.201,65		13.341,89	-	-	13.341,89	1.005.714,25	280,25	4,36					
					349,35			0,34	0,34														87,18	9.918,40		-	4.757,45
103.580,00	17,59			0,03						16.359,62	-	-	2.426,03	5.201,95		13.633,02	-	-	13.633,02	1.006.005,04	291,13	4,36					
					345,35			2,03	2,03														88,27	10.006,67		-	4.757,45
103.600,00	16,95			0,17						16.704,97	-	-	2.426,06	5.203,95		13.920,81	-	-	13.920,81	1.006.290,80	287,79	4,47					
					333,61			2,37	2,37														88,27	10.094,94		-	4.757,45
103.620,00	16,41			0,07						17.038,58	-	-	2.426,03	5.206,35		14.198,82	-	-	14.198,82	1.006.566,44	278,01	4,36					
					327,76			0,68	0,68														90,09	10.185,03		-	4.757,45
103.640,00	16,36			-						17.366,34	-	-	2.426,01	5.207,05		14.471,95	-	-	14.471,95	1.006.838,89	273,13	4,65					
					95,26			-	-														27,36	10.212,39		-	4.757,45
103.645,94	15,73			-						17.461,60	-	-	2.426,01	5.207,05		14.551,33	-	-	14.551,33	1.006.918,27	79,38	4,57					
					206,91			-	-														63,35	10.275,74		-	4.757,45
103.660,00	13,69			-						17.668,51	-	-	2.426,01	5.207,05		14.723,76	-	-	14.723,76	1.007.090,70	172,43	4,44					
					242,83			-	-														82,87	10.358,61		-	4.757,45
103.680,00	10,59			-						17.911,34	-	-	2.426,01	5.207,05		14.926,12	-	-	14.926,12	1.007.293,06	202,36	3,85					

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					43,83			-	-														16,14	10.374,75		-	4.757,45
103.684,22	10,17			-						17.955,17	-	-	2.426,01	5.207,05		14.962,64	-	-	14.962,64	1.007.329,58	36,52	3,80			-		
					149,05			-	-														58,75	10.433,50		-	4.757,45
103.700,00	8,72			-						18.104,22	-	-	2.426,01	5.207,05		15.086,85	-	-	15.086,85	1.007.453,79	124,21	3,64			-		
					163,54			-	-														71,81	10.505,31		-	4.757,45
103.720,00	7,64			-						18.267,76	-	-	2.426,01	5.207,05		15.223,13	-	-	15.223,13	1.007.590,07	136,28	3,54			-		
					19,23			-	-														8,93	10.514,24		-	4.757,45
103.722,51	7,71			-						18.286,99	-	-	2.426,01	5.207,05		15.239,16	-	-	15.239,16	1.007.606,10	16,03	3,59			-		
					136,96			-	-														64,15	10.578,39		-	4.757,45
103.740,00	7,94			-						18.423,95	-	-	2.426,01	5.207,05		15.353,29	-	-	15.353,29	1.007.720,23	114,13	3,74			-		
					156,91			-	-														75,72	10.654,11		-	4.757,45
103.760,00	7,75			-						18.580,86	-	-	2.426,01	5.207,05		15.484,05	-	-	15.484,05	1.007.850,99	130,76	3,83			-		
					24,31			-	-														12,06	10.666,17		-	4.757,45
103.763,21	7,41			-						18.605,17	-	-	2.426,01	5.207,05		15.504,31	-	-	15.504,31	1.007.871,25	20,26	3,69			-		
					81,27			-	-														41,12	10.707,29		-	4.757,45
103.774,26	7,39			-						18.686,44	-	-	2.426,01	5.207,05		15.572,03	-	-	15.572,03	1.007.938,97	67,72	3,80			-		
					43,08			-	-														22,16	10.729,45		-	4.757,45
103.780,00	7,61			-						18.729,52	-	-	2.426,01	5.207,05		15.607,93	-	-	15.607,93	1.007.974,87	35,90	3,92			-		
					204,34			-	-														22,76	10.752,21		-	4.757,45
103.785,31	69,42			-						18.933,86	-	-	2.426,01	5.207,05		15.778,22	-	-	15.778,22	1.008.145,16	170,29	4,66			-		
					1.140,70			-	-														69,57	10.821,78		-	4.757,45
103.800,00	85,83			-						20.074,56	-	-	2.426,01	5.207,05		16.728,80	-	-	16.728,80	1.009.095,74	950,58	4,81			-		
					1.674,53			-	-														95,80	10.917,58		-	4.757,45
103.820,00	81,62			-						21.749,09	-	-	2.426,01	5.207,05		18.124,24	-	-	18.124,24	1.010.491,18	1.395,44	4,77			-		
					857,51			4,08	4,08														84,14	11.001,72		-	4.757,45
103.840,00	4,13			0,41						22.606,60	-	-	2.425,99	5.211,15		18.838,83	-	-	18.838,83	1.011.201,69	714,59	3,64			-		
					78,36			8,17	8,17														70,59	11.072,31		-	4.757,45
103.860,00	3,71			0,41						22.684,96	-	-	2.425,96	5.219,35		18.904,13	-	-	18.904,13	1.011.258,82	65,30	3,42			-		
					71,10			15,50	15,50														68,14	11.140,45		-	4.757,45
103.880,00	3,40			1,14						22.756,06	-	-	2.425,96	5.234,85		18.963,38	-	-	18.963,38	1.011.302,57	59,25	3,40			-		
					72,83			28,55	28,55														69,53	11.209,98		-	4.757,45
103.900,00	3,88			1,71						22.828,89	-	-	2.426,01	5.263,35		19.024,08	-	-	19.024,08	1.011.334,72	60,70	3,56			-		
					80,36			33,78	33,78														71,93	11.281,91		-	4.757,45
103.920,00	4,16			1,66						22.909,25	-	-	2.426,09	5.297,05		19.091,04	-	-	19.091,04	1.011.367,90	66,96	3,64			-		
					62,85			26,48	26,48														54,63	11.336,54		-	4.757,45
103.935,30	4,06			1,80						22.972,10	-	-	2.426,10	5.323,52		19.143,42	-	-	19.143,42	1.011.393,80	52,38	3,50			-		
					18,93			8,39	8,39														16,42	11.352,96		-	4.757,45
103.940,00	4,00			1,78						22.991,03	-	-	2.426,08	5.331,93		19.159,19	-	-	19.159,19	1.011.401,18	15,77	3,49			-		
					89,87			29,14	29,14														74,15	11.427,11		-	4.757,45
103.960,00	5,01			1,15						23.080,90	-	-	2.425,92	5.361,23		19.234,08	-	-	19.234,08	1.011.446,93	74,89	3,95			-		
					91,20			22,12	22,12														73,66	11.500,77		-	4.757,45
103.980,00	4,13			1,07						23.172,10	-	-	2.425,84	5.383,43		19.310,08	-	-	19.310,08	1.011.500,81	76,00	3,44			-		
					80,28			19,78	19,78														68,40	11.569,17		-	4.757,45
104.000,00	3,92			0,92						23.252,38	-	-	2.425,72	5.403,33		19.376,98	-	-	19.376,98	1.011.547,93	66,90	3,42			-		
					38,87			9,87	9,87														33,93	11.603,10		-	4.757,45
104.009,72	4,08			1,11						23.291,25	-	-	2.425,73	5.413,19		19.409,38	-	-	19.409,38	1.011.570,46	32,40	3,56			-		
					40,33			11,69	11,69														36,44	11.639,54		-	4.757,45
104.020,00	3,78			1,17						23.331,58	-	-	2.425,70	5.424,91		19.442,98	-	-	19.442,98	1.011.592,37	33,60	3,55			-		
					71,91			23,82	23,82														69,30	11.708,84		-	4.757,45
104.040,00	3,43			1,22						23.403,49	-	-	2.425,62	5.448,81		19.502,91	-	-	19.502,91	1.011.628,48	59,93	3,40			-		
					69,15			25,12	25,12														67,74	11.776,58		-	4.757,45
104.060,00	3,51			1,30						23.472,64	-	-	2.425,54	5.474,01		19.560,53	-	-	19.560,53	1.011.660,98	57,62	3,40			-		
					70,70			30,18	30,18														69,07	11.845,65		-	4.757,45
104.080,00	3,59			1,73						23.543,34	-	-	2.425,42	5.504,31		19.619,45	-	-	19.619,45	1.011.689,72	58,92	3,54			-		
					14,82			7,15	7,15														14,62	11.860,27		-	4.757,45
104.084,14	3,58			1,73						23.558,16	-	-	2.425,41	5.511,47		19.631,80	-	-	19.631,80	1.011.694,92	12,35	3,54			-		
					56,99			27,78	27,78														56,09	11.916,36		-	4.757,45
104.100,00	3,61			1,77						23.615,15	-	-	2.425,43	5.539,23		19.679,29	-	-	19.679,29	1.011.714,63	47,49	3,54			-		
					96,88			36,60	36,60														74,96	11.991,32		-	4.757,45
104.120,00	6,08			1,89						23.712,03	-	-	2.425,43	5.575,83		19.760,03	-	-	19.760,03	1.011.758,77	80,74	3,96			-		
					96,41			29,78	29,78														74,96	12.066,28		-	4.757,45
104.140,00	3,56			1,09						23.808,44	-	-	2.425,41	5.605,63		19.840,37	-	-	19.840,37	1.011.809,33	80,34	3,54			-		
					36,75			9,41	9,41														29,92	12.096,20		-	4.757,45
104.147,69	6,00			1,35						23.845,19	-	-	2.425,43	5.615,02		19.870,99	-	-	19.870,99	1.011.830,54	30,62	4,24			-		
					88,59			13,32	13,32														52,17	12.148,37		-	4.757,45
104.160,00	8,37			0,83						23.933,78	-	-	2.425,34	5.628,43		19.944,82	-	-	19.944,82	1.011.891,05	73,83	4,25			-		
					187,33			15,37	15,37														85,17	12.233,54		-	4.757,45
104.180,00	10,31			0,72						24.121,11	-	-	2.425,21	5.643,93		20.100,93	-	-	20.100,93	1.012.031,79	156,11	4,28			-		
					234,24			7,45	7,45														86,84	12.320,38		-	4.757,45
104.200,00	13,06			0,03						24.355,35	-	-	2.425,16	5.651,43		20.296,12	-	-	20.296,12	1.012.219,53	195,19	4,42			-		
					129,37			0,61	0,61														43,84	12.364,22		-	4.757,45
104.209,93	12,95			0,10						24.484,72	-	-	2.425,12	5.652,08		20.403,93	-	-	20.403,93	1.012.326,73	107,81	4,43			-		
					150,58			0,48	0,48														46,04	12.410,26		-	4.757,45
104.220,00	16,91			-						24.635,30	-	-	2.425,10	5.652,58		20.529,42	-	-	20.529,42	1.012.451,74	125,49	4,73			-		
					325,93			-	-														100,34	12.510,60		-	4.757,45
104.240,00	15,69			-						24.961,23	-	-	2.425,10	5.652,58		20.801,03	-	-	20.801,03	1.012.723,35	271,61	5,35			-		
					296,63			-	-														98,36	12.608,96		-	4.757,45
104.260,00	14,06			-						25.257,86	-	-	2.425,10	5.652,58		21.048,22	-	-	21.048,22	1.012.970,54	247,19	4,56			-		
					169,13			-	-														55,12	12.664,08		-	4.757,45
104.272,17	13,86			-						25.426,99	-	-	2.425,10	5.652,58		21.189,16	-	-	21.189,16	1.013.111,48	140,94	4,56			-		
					110,75			-	-														35,99	12.700,07		-	4.757,45
104.280,00	14,42			-						25.537,74	-	-	2.425,10	5.652,58		21.281,45	-	-	21.281,45	1.013.203,77	92,29	4,63			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					332,51			-	-														92,32	12.792,39		-	4.757,45
104.300,00	18,84			-						25.870,25	-	-	2.425,10	5.652,58		21.558,54	-	-	21.558,54	1.013.480,86	277,09	4,61			-		
					407,17			-	-														93,16	12.885,55		-	4.757,45
104.320,00	21,88			-						26.277,42	-	-	2.425,10	5.652,58		21.897,85	-	-	21.897,85	1.013.820,17	339,31	4,71			-		
					439,36			1,87	1,87														95,08	12.980,63		-	4.757,45
104.340,00	22,05			0,19						26.716,78	-	-	2.425,07	5.654,48		22.263,98	-	-	22.263,98	1.014.184,43	366,13	4,80			-		
					498,05			3,92	3,92														90,17	13.070,80		-	4.757,45
104.360,00	27,75			0,21						27.214,83	-	-	2.424,99	5.658,48		22.679,02	-	-	22.679,02	1.014.595,55	415,04	4,22			-		
					283,74			0,99	0,99														40,97	13.111,77		-	4.757,45
104.369,66	31,02			-						27.498,57	-	-	2.424,97	5.659,49		22.915,48	-	-	22.915,48	1.014.831,02	236,46	4,27			-		
					324,12			-	-														43,63	13.155,40		-	4.757,45
104.380,00	32,76			-						27.822,69	-	-	2.424,97	5.659,49		23.185,58	-	-	23.185,58	1.015.101,12	270,10	4,33			-		
					595,33			0,42	0,42														86,41	13.241,81		-	4.757,45
104.400,00	27,93			0,04						28.418,02	-	-	2.424,99	5.659,89		23.681,68	-	-	23.681,68	1.015.596,80	496,10	4,49			-		
					194,44			0,21	0,21														32,08	13.273,89		-	4.757,45
104.407,38	25,90			0,02						28.612,46	-	-	2.424,98	5.660,11		23.843,72	-	-	23.843,72	1.015.758,63	162,04	4,40			-		
					303,50			0,16	0,16														54,11	13.328,00		-	4.757,45
104.420,00	23,23			0,01						28.915,96	-	-	2.424,95	5.660,30		24.096,63	-	-	24.096,63	1.016.011,38	252,91	4,37			-		
					403,82			0,17	0,17														86,46	13.414,46		-	4.757,45
104.440,00	18,04			0,01						29.319,78	-	-	2.424,92	5.660,50		24.433,15	-	-	24.433,15	1.016.347,73	336,52	4,48			-		
					87,06			0,13	0,13														22,28	13.436,74		-	4.757,45
104.445,10	16,85			0,05						29.406,84	-	-	2.424,89	5.660,66		24.505,70	-	-	24.505,70	1.016.420,15	72,55	4,46			-		
					244,94			0,35	0,35														66,44	13.503,18		-	4.757,45
104.460,00	16,02			-						29.651,78	-	-	2.424,87	5.661,03		24.709,82	-	-	24.709,82	1.016.623,92	204,12	4,46			-		
					295,14			-	-														89,60	13.592,78		-	4.757,45
104.480,00	13,49			-						29.946,92	-	-	2.424,87	5.661,03		24.955,77	-	-	24.955,77	1.016.869,87	245,95	4,50			-		
					229,86			-	-														89,60	13.682,38		-	4.757,45
104.500,00	9,49			-						30.176,78	-	-	2.424,87	5.661,03		25.147,32	-	-	25.147,32	1.017.061,42	191,55	4,46			-		
					94,92			-	-														44,58	13.726,96		-	4.757,45
104.520,00	-			-						30.271,70	-	-	2.424,87	5.661,03		25.226,42	-	-	25.226,42	1.017.140,52	79,10	-			-		
					-			-	-														-	13.726,96		-	4.757,45
104.536,20	-			-						30.271,70	-	-	2.424,87	5.661,03		25.226,42	-	-	25.226,42	1.017.140,52	-	-			-		
					-			-	-														-	13.726,96		-	4.757,45
104.540,00	-			-						30.271,70	-	-	2.424,87	5.661,03		25.226,42	-	-	25.226,42	1.017.140,52	-	-			-		
					80,23			39,56	39,56														58,18	13.785,14		138,40	4.895,85
104.560,00	8,08			4,03						30.351,93	-	-	2.424,13	5.701,33		25.293,28	-	-	25.293,28	1.017.167,82	66,86	5,87			13,92		
					157,05			74,36	74,36														117,97	13.903,11		304,69	5.200,54
104.580,00	7,72			3,52						30.508,98	-	-	2.422,99	5.776,83		25.424,15	-	-	25.424,15	1.017.224,33	130,87	6,02			16,70		
					127,07			65,89	65,89														97,09	14.000,20		288,96	5.489,50
104.596,55	7,72			4,56						30.636,05	-	-	2.422,01	5.843,70		25.530,04	-	-	25.530,04	1.017.264,33	105,89	5,81			18,40		
					26,44			15,46	15,46														20,01	14.020,21		63,06	5.552,56
104.600,00	7,62			4,41						30.662,49	-	-	2.422,01	5.859,16		25.552,08	-	-	25.552,08	1.017.270,91	22,04	5,81			18,20		
					162,07			74,23	74,23														112,92	14.133,13		411,72	5.964,28
104.620,00	8,70			3,16						30.824,56	-	-	2.420,54	5.934,86		25.687,13	-	-	25.687,13	1.017.331,73	135,05	5,60			23,20		
					173,11			68,42	68,42														112,98	14.246,11		448,92	6.413,20
104.640,00	8,72			3,81						30.997,67	-	-	2.419,26	6.004,56		25.831,39	-	-	25.831,39	1.017.407,57	144,26	5,80			21,92		
					143,31			47,52	47,52														95,69	14.341,80		362,74	6.775,94
104.656,91	8,33			1,90						31.140,98	-	-	2.418,50	6.052,84		25.950,82	-	-	25.950,82	1.017.479,48	119,43	5,61			21,20		
					25,82			6,41	6,41														17,34	14.359,14		65,59	6.841,53
104.660,00	8,38			2,25						31.166,80	-	-	2.418,50	6.059,25		25.972,33	-	-	25.972,33	1.017.494,58	21,51	5,61			21,24		
					163,09			74,13	74,13														112,21	14.471,35		435,10	7.276,63
104.680,00	7,93			5,16						31.329,89	-	-	2.418,53	6.133,35		26.108,24	-	-	26.108,24	1.017.556,36	135,91	5,61			22,27		
					150,74			120,79	120,79														112,21	14.583,56		416,54	7.693,17
104.700,00	7,14			6,92						31.480,63	-	-	2.421,96	6.250,71		26.233,86	-	-	26.233,86	1.017.561,19	125,62	5,61			19,39		
					139,90			189,35	116,58														114,22	14.697,78		377,38	8.070,55
104.720,00	6,85			12,02						31.620,53	-	-	2.493,95	6.368,07		26.350,44	-	-	26.350,44	1.017.488,42	116,58	5,81			18,35		
					68,47			120,18	57,06														58,11	14.755,89		183,51	8.254,06
104.740,00	-			-						31.689,00	-	-	2.496,77	6.485,43		26.407,50	-	-	26.407,50	1.017.425,30	57,06	-			-		
					-			-	-														-	14.755,89		-	8.254,06
104.760,00	-			-						31.689,00	-	-	2.496,77	6.485,43		26.407,50	-	-	26.407,50	1.017.425,30	-	-			-		
					69,42			165,09	57,85														54,10	14.809,99		182,08	8.436,14
104.780,00	6,94			16,51						31.758,42	-	-	2.544,50	6.602,79		26.465,35	-	-	26.465,35	1.017.318,06	57,85	5,41			18,21		
					142,50			259,30	118,75														106,20	14.916,19		362,95	8.799,09
104.800,00	7,31			9,42						31.900,92	-	-	2.686,44	6.720,15		26.584,10	-	-	26.584,10	1.017.177,51	118,75	5,21			18,09		
					147,74			165,68	123,12														102,20	15.018,39		346,36	9.145,45
104.820,00	7,47			7,15						32.048,66	-	-	2.734,76	6.837,51		26.707,22	-	-	26.707,22	1.017.134,95	123,12	5,01			16,55		
					137,49			125,88	114,58														98,19	15.116,58		232,35	9.377,80
104.840,00	6,28			5,44						32.186,15	-	-	2.743,28	6.954,87		26.821,79	-	-	26.821,79	1.017.123,64	114,57	4,81			6,69		
					123,24			89,15	89,15														94,18	15.210,76		108,46	9.486,26
104.860,00	6,04			3,47						32.309,39	-	-	2.743,33	7.043,97		26.924,49	-	-	26.924,49	1.017.137,19	102,70	4,61			4,16		
					55,46			28,38	28,38														41,36	15.252,12		35,01	9.521,27
104.869,17	6,05			2,71						32.364,85	-	-	2.743,36	7.072,32		26.970,71	-	-	26.970,71	1.017.155,03	46,22	4,41			3,47		
					65,04			30,03	30,03														47,91	15.300,03		32,17	9.553,44
104.880,00	5,94			2,78						32.429,89	-	-	2.743,67	7.102,04		27.024,91	-	-	27.024,91	1.017.179,20	54,20	4,40			2,43		
					112,21			35,26	35,26														86,38	15.386,41		48,02	9.601,46
104.900,00	5,26			0,71						32.542,10	-	-	2.744,03	7.136,94		27.118,42	-	-	27.118,42	1.017.237,45	93,51	4,20			2,35		
					117,75			7,81	7,81														84,30	15.470,71		23,58	9.625,04
104.920,00	6,47			0,06						32.659,85	-	-	2.744,14	7.144,64		27.216,54	-	-	27.216,54	1.017.327,76	98,12	4,20			-		
					151,12			3,07	3,07														86,46	15.557,17		-	9.625,04
104.940,00	8,54			0,24						32.810,97	-	-	2.744,21	7.147,64		27.342,48	-	-	27.342,48	1.017.450,63	125,94	4,41			-		
					204,56			4,03	4,03														92,74	15.649,91		-	9.625,04
104.960,00	11,76			0,16						33.015,53	-	-	2.744,24	7.151,64		27.512,94	-	-	27.512,94	1.017.617,06	170,46	4,83			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					213,17			18,28	18,28														95,16	15.745,07		-	9.625,04
104.980,00	9,38			1,67						33.228,70	-	-	2.744,22	7.169,94		27.690,58	-	-	27.690,58	1.017.776,42	177,64	4,65					
					187,11			29,90	29,90														92,28	15.837,35		-	9.625,04
105.000,00	9,16			1,32						33.415,81	-	-	2.744,22	7.199,84		27.846,51	-	-	27.846,51	1.017.902,45	155,93	4,53					
					197,49			22,44	22,44														92,89	15.930,24		-	9.625,04
105.020,00	10,40			0,92						33.613,30	-	-	2.744,26	7.222,24		28.011,08	-	-	28.011,08	1.018.044,58	164,57	4,71					
					204,77			24,71	24,71														95,02	16.025,26		-	9.625,04
105.040,00	9,89			1,55						33.818,07	-	-	2.744,27	7.246,94		28.181,72	-	-	28.181,72	1.018.190,51	170,64	4,75					
					160,29			26,84	26,84														82,17	16.107,43		-	9.625,04
105.057,61	8,16			1,50						33.978,36	-	-	2.744,25	7.273,80		28.315,30	-	-	28.315,30	1.018.297,25	133,58	4,54					
					19,25			3,41	3,41														10,90	16.118,33		-	9.625,04
105.060,00	7,96			1,35						33.997,61	-	-	2.744,26	7.277,20		28.331,34	-	-	28.331,34	1.018.309,88	16,04	4,59					
					164,40			13,50	13,50														92,56	16.210,89		-	9.625,04
105.080,00	8,40			-						34.162,01	-	-	2.744,26	7.290,70		28.468,34	-	-	28.468,34	1.018.433,38	137,00	4,64					
					164,48			0,01	0,01														91,47	16.302,36		-	9.625,04
105.100,00	8,02			-						34.326,49	-	-	2.744,27	7.290,70		28.605,41	-	-	28.605,41	1.018.570,44	137,07	4,48					
					136,09			2,13	2,13														87,94	16.390,30		-	9.625,04
105.120,00	5,56			0,21						34.462,58	-	-	2.744,30	7.292,80		28.718,82	-	-	28.718,82	1.018.681,72	113,41	4,28					
					105,07			11,76	11,76														85,44	16.475,74		38,48	9.663,52
105.140,00	4,92			0,96						34.567,65	-	-	2.744,36	7.304,50		28.806,38	-	-	28.806,38	1.018.757,52	87,56	4,23			3,81		
					100,32			110,11	83,60														93,49	16.569,23		117,86	9.781,38
105.160,00	5,06			9,91						34.667,97	-	-	2.745,77	7.413,20		28.889,98	-	-	28.889,98	1.018.731,01	83,60	5,06			7,85		
					101,47			208,18	84,56														101,47	16.670,70		152,18	9.933,56
105.180,00	5,01			10,65						34.769,44	-	-	2.836,59	7.530,56		28.974,53	-	-	28.974,53	1.018.607,38	84,55	5,01			7,20		
					101,85			197,83	84,88														101,85	16.772,55		148,33	10.081,89
105.200,00	5,10			8,91						34.871,29	-	-	2.917,06	7.647,92		29.059,41	-	-	29.059,41	1.018.494,43	84,88	5,10			7,47		
					102,33			184,01	85,28														102,33	16.874,88		151,28	10.233,17
105.220,00	5,06			9,29						34.973,62	-	-	2.983,71	7.765,28		29.144,68	-	-	29.144,68	1.018.395,69	85,27	5,06			7,49		
					100,03			164,83	83,36														100,01	16.974,89		134,14	10.367,31
105.240,00	4,88			7,04						35.073,65	-	-	3.031,18	7.882,64		29.228,04	-	-	29.228,04	1.018.314,22	83,36	4,88			5,77		
					29,43			37,60	24,53														29,21	17.004,10		38,71	10.406,02
105.246,05	4,85			5,39						35.103,08	-	-	3.033,28	7.918,14		29.252,57	-	-	29.252,57	1.018.301,15	24,53	4,78			7,03		
					68,66			61,36	57,22														66,06	17.070,16		95,25	10.501,27
105.260,00	5,00			3,40						35.171,74	-	-	3.033,33	7.979,45		29.309,78	-	-	29.309,78	1.018.297,00	57,21	4,70			6,63		
					96,86			51,63	51,63														90,19	17.160,35		135,97	10.637,24
105.280,00	4,69			1,76						35.268,60	-	-	3.033,36	8.031,05		29.390,50	-	-	29.390,50	1.018.326,09	80,72	4,32			6,97		
					100,78			27,42	27,42														86,46	17.246,81		136,59	10.773,83
105.300,00	5,39			0,98						35.369,38	-	-	3.033,38	8.058,45		29.474,48	-	-	29.474,48	1.018.382,65	83,98	4,32			6,69		
					107,72			16,11	16,11														87,34	17.334,15		126,28	10.900,11
105.320,00	5,38			0,63						35.477,10	-	-	3.033,39	8.074,55		29.564,25	-	-	29.564,25	1.018.456,31	89,77	4,41			5,94		
					103,00			13,01	13,01														87,10	17.421,25		107,25	11.007,36
105.340,00	4,92			0,67						35.580,10	-	-	3.033,40	8.087,55		29.650,08	-	-	29.650,08	1.018.529,13	85,83	4,30			4,79		
					105,68			8,81	8,81														85,16	17.506,41		101,58	11.108,94
105.360,00	5,65			0,21						35.685,78	-	-	3.033,41	8.096,35		29.738,15	-	-	29.738,15	1.018.608,39	88,07	4,22			5,37		
					123,98			4,22	4,22														85,16	17.591,57		96,08	11.205,02
105.380,00	6,75			0,21						35.809,76	-	-	3.033,43	8.100,55		29.841,47	-	-	29.841,47	1.018.707,49	103,32	4,30			4,24		
					156,24			2,71	2,71														85,98	17.677,55		95,34	11.300,36
105.400,00	8,88			0,06						35.966,00	-	-	3.033,44	8.103,25		29.971,67	-	-	29.971,67	1.018.834,98	130,20	4,30			5,30		
					168,34			2,20	2,20														86,73	17.764,28		98,07	11.398,43
105.420,00	7,96			0,16						36.134,34	-	-	3.033,44	8.105,45		30.111,95	-	-	30.111,95	1.018.973,06	140,28	4,37			4,51		
					166,27			3,24	3,24														86,73	17.851,01		95,64	11.494,07
105.440,00	8,67			0,16						36.300,61	-	-	3.033,48	8.108,65		30.250,51	-	-	30.250,51	1.019.108,38	138,56	4,30			5,05		
					185,13			1,61	1,61														86,96	17.937,97		114,26	11.608,33
105.460,00	9,84			-						36.485,74	-	-	3.033,49	8.110,25		30.404,78	-	-	30.404,78	1.019.261,04	154,27	4,40			6,37		
					13,85			-	-														6,10	17.944,07		4,47	11.612,80
105.461,40	9,90			-						36.499,59	-	-	3.033,49	8.110,25		30.416,32	-	-	30.416,32	1.019.272,58	11,54	4,30			-		
					182,87			-	-														80,40	18.024,47		-	11.612,80
105.480,00	9,84			-						36.682,46	-	-	3.033,49	8.110,25		30.568,72	-	-	30.568,72	1.019.424,98	152,40	4,38			-		
					179,84			1,21	1,21														87,90	18.112,37		61,97	11.674,77
105.500,00	8,23			0,12						36.862,30	-	-	3.033,50	8.111,45		30.718,58	-	-	30.718,58	1.019.573,63	149,86	4,45			6,24		
					25,50			0,45	0,45														13,94	18.126,31		19,71	11.694,48
105.503,16	7,91			0,16						36.887,80	-	-	3.033,51	8.111,89		30.739,83	-	-	30.739,83	1.019.594,43	21,25	4,37			6,23		
					135,16			4,50	4,50														74,79	18.201,10		110,54	11.805,02
105.520,00	8,24			0,38						37.022,96	-	-	3.033,46	8.116,44		30.852,47	-	-	30.852,47	1.019.702,57	112,64	4,56			7,00		
					81,93			3,74	3,74														45,33	18.246,43		69,43	11.874,45
105.540,00	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	68,27	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.544,92	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.560,00	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.573,60	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.580,00	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.584,77	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					-			-	-														-	18.246,43		-	11.874,45
105.595,93	-			-						37.104,89	-	-	3.033,40	8.120,24		30.920,74	-	-	30.920,74	1.019.767,10	-	-			-		
					21,20			0,17	0,17														8,77	18.255,20		26,14	11.900,59
105.600,00	10,43			0,08						37.126,09	-	-	3.033,41	8.120,40		30.938,41	-	-	30.938,41	1.019.784,60	17,67	4,31			12,86		
					208,49			19,85	19,85														93,84	18.349,04		279,88	12.180,47
105.620,00	10,42			1,90						37.334,58	-	-	3.033,46	8.140,20		31.112,15	-	-	31.112,15	1.019.938,49	173,74	5,07			15,13		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					130,87			73,28	73,28														74,51	18.423,55		234,75	12.415,22
105.633,98	8,30			8,58						37.465,45	-	-	3.033,47	8.213,47		31.221,21	-	-	31.221,21	1.019.974,27	109,06	5,59					
					53,68			37,11	37,11														33,85	18.457,40		112,01	12.527,23
105.640,00	9,54			3,76						37.519,13	-	-	3.035,27	8.248,78		31.265,94	-	-	31.265,94	1.019.981,89	44,73	5,66					
					72,17			26,07	26,07														40,62	18.498,02		137,78	12.665,01
105.647,15	10,64			3,53						37.591,30	-	-	3.035,28	8.274,84		31.326,08	-	-	31.326,08	1.020.015,96	60,14	5,70					
					139,96			75,48	75,48														75,28	18.573,30		255,00	12.920,01
105.660,00	11,14			8,21						37.731,26	-	-	3.035,35	8.350,25		31.442,72	-	-	31.442,72	1.020.057,12	116,64	6,02					
					3,54			2,61	2,61														1,91	18.575,21		6,34	12.926,35
105.660,32	11,10			8,20						37.734,80	-	-	3.036,10	8.352,11		31.445,67	-	-	31.445,67	1.020.057,46	2,95	5,96					
					222,60			114,05	114,05														118,80	18.694,01		406,39	13.332,74
105.680,00	11,52			3,39						37.957,40	-	-	3.036,09	8.466,17		31.631,17	-	-	31.631,17	1.020.128,91	185,50	6,11					
					221,28			44,25	44,25														108,08	18.802,09		381,58	13.714,32
105.700,00	10,60			1,03						38.178,68	-	-	3.036,14	8.510,37		31.815,57	-	-	31.815,57	1.020.269,06	184,40	4,70					
					228,97			17,58	17,58														94,99	18.897,08		348,73	14.063,05
105.720,00	12,29			0,73						38.407,65	-	-	3.036,12	8.527,97		32.006,38	-	-	32.006,38	1.020.442,29	190,81	4,80					
					269,90			91,40	91,40														111,25	19.008,33		409,44	14.472,49
105.740,00	14,70			8,41						38.677,55	-	-	3.036,12	8.619,37		32.231,29	-	-	32.231,29	1.020.575,80	224,91	6,33					
					297,31			351,65	247,76														130,97	19.139,30		466,19	14.938,68
105.760,00	15,03			26,75						38.974,86	-	-	3.270,41	8.736,73		32.479,05	-	-	32.479,05	1.020.471,91	247,76	6,77					
					301,34			554,42	251,12														135,33	19.274,63		460,63	15.399,31
105.780,00	15,10			28,69						39.276,20	-	-	3.707,47	8.854,09		32.730,17	-	-	32.730,17	1.020.168,61	251,12	6,76					
					289,77			377,63	241,48														124,33	19.398,96		374,04	15.773,35
105.800,00	13,88			9,07						39.565,97	-	-	3.967,74	8.971,45		32.971,64	-	-	32.971,64	1.020.032,45	241,47	5,67					
					277,50			204,11	204,11														112,94	19.511,90		286,46	16.059,81
105.820,00	13,87			11,34						39.843,47	-	-	4.054,49	9.088,81		33.202,89	-	-	33.202,89	1.020.059,59	231,25	5,62					
					288,37			244,73	240,31														115,70	19.627,60		287,93	16.347,74
105.840,00	14,96			13,13						40.131,84	-	-	4.181,86	9.206,17		33.443,20	-	-	33.443,20	1.020.055,17	240,31	5,95					
					273,81			278,98	228,18														118,37	19.745,97		301,03	16.648,77
105.860,00	12,42			14,76						40.405,65	-	-	4.343,48	9.323,53		33.671,38	-	-	33.671,38	1.020.004,37	228,18	5,89					
					233,53			284,81	194,61														116,33	19.862,30		289,50	16.938,27
105.880,00	10,94			13,72						40.639,18	-	-	4.510,93	9.440,89		33.865,98	-	-	33.865,98	1.019.914,16	194,60	5,74					
					132,17			143,21	110,14														67,79	19.930,09		216,24	17.154,51
105.891,93	11,23			10,30						40.771,35	-	-	4.584,15	9.510,88		33.976,12	-	-	33.976,12	1.019.881,09	110,14	5,62					
					75,52			65,40	62,93														39,63	19.969,72		156,45	17.310,96
105.898,90	10,45			8,48						40.846,87	-	-	4.608,66	9.551,77		34.039,06	-	-	34.039,06	1.019.878,63	62,94	5,75					
					11,39			9,34	9,34														6,34	19.976,06		24,91	17.335,87
105.900,00	10,16			8,42						40.858,26	-	-	4.611,52	9.558,25		34.048,55	-	-	34.048,55	1.019.878,78	9,49	5,73					
					57,35			48,69	47,79														34,28	20.010,34		132,69	17.468,56
105.905,86	9,40			8,19						40.915,61	-	-	4.625,81	9.592,65		34.096,34	-	-	34.096,34	1.019.877,88	47,79	5,97					
					132,01			107,88	107,88														84,01	20.094,35		341,31	17.809,87
105.920,00	9,27			7,07						41.047,62	-	-	4.650,73	9.675,61		34.206,35	-	-	34.206,35	1.019.880,01	110,01	5,92					
					175,49			176,91	146,24														123,43	20.217,78		496,99	18.306,86
105.940,00	8,28			10,62						41.223,11	-	-	4.710,28	9.792,97		34.352,59	-	-	34.352,59	1.019.849,34	146,24	6,43					
					100,44			146,03	83,70														79,49	20.297,27		312,06	18.618,92
105.952,07	8,36			13,57						41.323,55	-	-	4.785,47	9.863,81		34.436,29	-	-	34.436,29	1.019.787,01	83,70	6,74					
					64,50			118,33	53,75														52,72	20.349,99		212,18	18.831,10
105.960,00	7,91			16,28						41.388,05	-	-	4.857,28	9.910,33		34.490,04	-	-	34.490,04	1.019.722,43	53,75	6,56					
					1,25			2,58	1,04														1,04	20.351,03		4,13	18.835,23
105.960,16	7,91			16,31						41.389,30	-	-	4.858,93	9.911,26		34.491,08	-	-	34.491,08	1.019.720,89	1,04	6,56					
					61,50			236,79	51,25														54,65	20.405,68		158,87	18.994,10
105.968,24	7,30			42,26						41.450,80	-	-	5.048,27	9.958,71		34.542,33	-	-	34.542,33	1.019.535,35	51,25	6,96					
					79,14			443,45	65,95														75,52	20.481,20		154,33	19.148,43
105.980,00	6,17			33,18						41.529,94	-	-	5.422,74	10.027,69		34.608,28	-	-	34.608,28	1.019.157,85	65,95	5,89					
					127,69			380,80	106,41														109,03	20.590,23		273,03	19.421,46
106.000,00	6,60			4,90						41.657,63	-	-	5.686,18	10.145,05		34.714,69	-	-	34.714,69	1.018.883,46	106,41	5,01					
					126,69			70,91	70,91														93,74	20.683,97		263,32	19.684,78
106.020,00	6,07			2,19						41.784,32	-	-	5.686,19	10.215,95		34.820,27	-	-	34.820,27	1.018.918,13	105,58	4,36					
					118,53			95,49	95,49														94,25	20.778,22		241,05	19.925,83
106.040,00	5,79			7,36						41.902,85	-	-	5.686,18	10.311,45		34.919,04	-	-	34.919,04	1.018.921,41	98,77	5,06					
					116,68			82,62	82,62														93,22	20.871,44		236,85	20.162,68
106.060,00	5,88			0,90						42.019,53	-	-	5.686,20	10.394,05		35.016,28	-	-	35.016,28	1.018.936,03	97,24	4,26					
					122,66			9,51	9,51														82,14	20.953,58		214,88	20.377,56
106.080,00	6,39			0,05						42.142,19	-	-	5.686,21	10.403,55		35.118,49	-	-	35.118,49	1.019.028,73	102,21	3,96					
					132,46			0,49	0,49														79,10	21.032,68		186,76	20.564,32
106.100,00	6,86			-						42.274,65	-	-	5.686,20	10.404,05		35.228,88	-	-	35.228,88	1.019.138,63	110,39	3,95					
					124,00			1,45	1,45														79,25	21.111,93		167,11	20.731,43
106.120,00	5,54			0,15						42.398,65	-	-	5.686,15	10.405,55		35.332,21	-	-	35.332,21	1.019.240,51	103,33	3,97					
					107,57			1,81	1,81														76,48	21.188,41		149,49	20.880,92
106.138,97	5,80			0,05						42.506,22	-	-	5.686,06	10.407,45		35.421,85	-	-	35.421,85	1.019.328,34	89,64	4,09					
					5,71			0,14	0,14														4,14	21.192,55		7,96	20.888,88
106.140,00	5,26			0,23						42.511,93	-	-	5.686,06	10.407,59		35.426,61	-	-	35.426,61	1.019.332,96	4,76	3,93					
					43,03			0,89	0,89														30,25	21.222,80		59,06	20.947,94
106.147,69	5,93			-						42.554,96	-	-	5.686,07	10.408,47		35.462,47	-	-	35.462,47	1.019.367,93	35,86	3,94					
					52,70			0,08	0,08														34,74	21.257,54		69,79	21.017,73
106.156,41	6,15			0,02						42.607,66	-	-	5.686,06	10.408,56		35.506,38	-	-	35.506,38	1.019.411,76	43,91	4,03					
					21,84			0,64	0,64														14,71	21.272,25		28,81	21.046,54
106.160,00	6,00			0,34						42.629,50	-	-	5.686,05	10.409,21		35.524,58	-	-	35.524,58	1.019.429,32	18,20	4,17					
					99,61			10,40	10,40														80,87	21.353,12		79,01	21.125,55
106.180,00	3,96			0,70						42.729,11	-	-	5.686,05	10.419,61		35.607,59	-	-	35.607,59	1.019.501,93	83,01	3,92					
					37,61			9,29	9,29														37,03	21.390,15		-	21.125,55
106.189,27	4,16			1,30						42.766,72	-	-	5.686,07	10.428,88		35.638,93	-	-	35.638,93	1.019.523,98	31,34	4,07					

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					44,70			9,44	9,44														42,57	21.432,72		-	21.125,55
106.200,00	4,20			0,46						42.811,42	-	-	5.686,07	10.438,32		35.676,18	-	-	35.676,18	1.019.551,79	37,25	3,89					
					102,12			4,62	4,62														80,17	21.512,89		-	21.125,55
106.220,00	6,04			-						42.913,54	-	-	5.686,09	10.442,92		35.761,28	-	-	35.761,28	1.019.632,27	85,10	4,15					
					123,22			-	-														83,83	21.596,72		-	21.125,55
106.240,00	6,31			-						43.036,76	-	-	5.686,09	10.442,92		35.863,97	-	-	35.863,97	1.019.734,96	102,69	4,25					
					116,39			1,94	1,94														84,33	21.681,05		-	21.125,55
106.260,00	5,37			0,19						43.153,15	-	-	5.686,13	10.444,82		35.960,96	-	-	35.960,96	1.019.830,01	96,99	4,21					
					84,05			6,85	6,85														68,24	21.749,29		33,08	21.158,63
106.276,01	5,17			0,66						43.237,20	-	-	5.686,18	10.451,62		36.031,00	-	-	36.031,00	1.019.893,20	70,04	4,35			4,11		
					20,86			3,51	3,51														17,55	21.766,84		16,02	21.174,65
106.280,00	5,28			1,10						43.258,06	-	-	5.686,17	10.455,14		36.048,38	-	-	36.048,38	1.019.907,07	17,38	4,45			3,91		
					96,22			32,91	32,91														87,56	21.854,40		80,05	21.254,70
106.300,00	4,37			2,20						43.354,28	-	-	5.686,08	10.488,14		36.128,57	-	-	36.128,57	1.019.954,35	80,19	4,33			4,07		
					88,90			57,48	57,48														87,84	21.942,24		101,19	21.355,89
106.320,00	4,55			3,58						43.443,18	-	-	5.685,76	10.545,94		36.202,65	-	-	36.202,65	1.019.970,95	74,08	4,48			6,03		
					95,80			49,75	49,75														91,24	22.033,48		144,58	21.500,47
106.340,00	5,06			1,43						43.538,98	-	-	5.685,41	10.596,04		36.282,48	-	-	36.282,48	1.020.001,03	79,83	4,68			8,42		
					105,27			72,06	72,06														94,44	22.127,92		200,11	21.700,58
106.360,00	5,49			5,84						43.644,25	-	-	5.684,77	10.668,74		36.370,21	-	-	36.370,21	1.020.016,70	87,73	4,80			11,59		
					14,50			19,81	12,08														13,54	22.141,46		28,07	21.728,65
106.362,75	5,06			8,56						43.658,75	-	-	5.688,45	10.684,87		36.382,29	-	-	36.382,29	1.020.008,97	12,08	5,05			8,84		
					87,20			185,79	72,67														87,15	22.228,61		157,26	21.885,91
106.380,00	5,05			12,97						43.745,95	-	-	5.773,01	10.786,10		36.454,96	-	-	36.454,96	1.019.895,85	72,67	5,05			9,40		
					103,11			298,33	85,93														103,07	22.331,68		139,94	22.025,85
106.400,00	5,26			16,86						43.849,06	-	-	5.953,98	10.903,46		36.540,88	-	-	36.540,88	1.019.683,44	85,92	5,25			4,60		
					113,20			446,74	94,33														113,17	22.444,85		133,81	22.159,66
106.420,00	6,06			27,82						43.962,26	-	-	6.283,36	11.020,82		36.635,22	-	-	36.635,22	1.019.331,04	94,34	6,06			8,78		
					133,38			737,34	111,15														133,38	22.578,23		124,67	22.284,33
106.440,00	7,28			45,92						44.095,64	-	-	6.903,34	11.138,18		36.746,37	-	-	36.746,37	1.018.704,85	111,15	7,28			3,69		
					71,74			526,38	59,78														71,74	22.649,97		31,09	22.315,42
106.449,63	7,63			63,43						44.167,38	-	-	7.373,23	11.194,67		36.806,15	-	-	36.806,15	1.018.238,25	59,78	7,63			2,77		
					80,51			614,80	67,09														80,51	22.730,48		34,81	22.350,23
106.460,00	8,06			55,59						44.247,89	-	-	7.927,16	11.255,54		36.873,24	-	-	36.873,24	1.017.690,54	67,09	8,06			3,85		
					190,60			1.707,36	158,83														173,12	22.903,60		38,82	22.389,05
106.480,00	11,21			115,18						44.438,49	-	-	9.517,16	11.372,90		37.032,07	-	-	37.032,07	1.016.142,01	158,83	9,42			-		
					166,50			1.336,02	138,75														141,79	23.045,39		68,62	22.457,67
106.494,89	11,42			63,71						44.604,99	-	-	10.765,78	11.460,30		37.170,82	-	-	37.170,82	1.014.944,74	138,75	9,80			9,05		
					56,59			238,17	47,16														48,01	23.093,40		77,06	22.534,73
106.500,00	10,74			29,58						44.661,58	-	-	10.973,99	11.490,26		37.217,98	-	-	37.217,98	1.014.753,73	47,16	9,00			21,13		
					228,33			1.034,34	190,28														190,08	23.283,48		356,78	22.891,51
106.520,00	12,47			73,32						44.889,91	-	-	11.890,97	11.607,62		37.408,26	-	-	37.408,26	1.013.909,67	190,28	10,26			14,12		
					201,38			1.801,95	167,82														180,02	23.463,50		142,80	23.034,31
106.540,00	7,64			103,02						45.091,29	-	-	13.575,56	11.724,98		37.576,08	-	-	37.576,08	1.012.275,54	167,82	7,64			-		
					1,22			16,33	1,02														1,22	23.464,72		-	23.034,31
106.540,16	7,61			101,39						45.092,51	-	-	13.590,95	11.725,92		37.577,09	-	-	37.577,09	1.012.260,22	1,01	7,61			-		
					101,35			1.005,84	84,46														101,35	23.566,07		-	23.034,31
106.560,00	2,61			-						45.193,86	-	-	14.480,37	11.842,34		37.661,55	-	-	37.661,55	1.011.338,84	84,46	2,61			-		
					26,09			-	-														26,09	23.592,16		-	23.034,31
106.580,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	21,74	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.600,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.620,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.640,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.660,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.680,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.700,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.720,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					-			-	-														-	23.592,16		-	23.034,31
106.740,00	-			-						45.219,95	-	-	14.480,37	11.842,34		37.683,29	-	-	37.683,29	1.011.360,58	-	-			-		
					55,44			169,42	46,20														55,44	23.647,60		-	23.034,31
106.760,00	5,54			16,94						45.275,39	-	-	14.532,43	11.959,70		37.729,49	-	-	37.729,49	1.011.237,36	46,20	5,54			-		
					143,15			2.537,14	119,29														143,15	23.790,75		-	23.034,31
106.780,00	8,77			236,77						45.418,54	-	-	16.952,21	12.077,06		37.848,78	-	-	37.848,78	1.008.819,51	119,29	8,77			-		
					172,00			4.472,87	143,33														172,00	23.962,75		-	23.034,31
106.800,00	8,43			210,52						45.590,54	-	-	21.307,72	12.194,42		37.992,12	-	-	37.992,12	1.004.489,98	143,34	8,43			-		
					164,56			4.168,75	137,13														164,56	24.127,31		-	23.034,31
106.820,00	8,03			206,36						45.755,10	-	-	25.359,11	12.311,78		38.129,25	-	-	38.129,25	1.000.458,36	137,13	8,03			-		
					160,54			4.037,17	133,78														160,54	24.287,85		-	23.034,31
106.840,00	8,03			197,36						45.915,64	-	-	29.278,92	12.429,14		38.263,03	-	-	38.263,03	996.554,97	133,78	8,03			-		
					160,54			3.828,88	133,78														160,54	24.448,39		-	23.034,31
106.860,00	8,03			185,53						46.076,18	-	-	32.990,44	12.546,50		38.396,82	-	-	38.396,82	992.859,88	133,79	8,03			-		
					162,56			3.346,20	135,47														162,55	24.610,94		-	23.034,31
106.880,00	8,23			149,09						46.238,74	-	-	36.219,28	12.663,86		38.532,28	-	-	38.532,28	989.649,14	135,46	8,23			-		
					82,29			1.490,89	68,58														82,28	24.693,22		-	23.034,31
106.900,00	-			-						46.321,03	-	-	37.592,81	12.781,22		38.600,86	-	-	38.600,86	988.226,83	68,58	-			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)			Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9		(m³)							
					-			-	-														-	24.693,22		-	23.034,31
106.920,00	-			-						46.321,03	-	-	37.592,81	12.781,22		38.600,86	-	-	38.600,86	988.226,83	-	-			-		
					27,10			-	-														27,10	24.720,32		-	23.034,31
106.940,00	2,71			-						46.348,13	-	-	37.592,81	12.781,22		38.623,44	-	-	38.623,44	988.249,41	22,58	2,71			-		
					133,24			2.004,43	111,03														133,24	24.853,56		278,29	23.312,60
106.960,00	10,61			200,44						46.481,37	-	-	39.479,88	12.898,58		38.734,48	-	-	38.734,48	986.356,02	111,04	10,61			27,83		
					124,04			2.394,69	103,37														124,04	24.977,60		325,42	23.638,02
106.971,68	10,62			209,56						46.605,41	-	-	41.806,03	12.967,12		38.837,84	-	-	38.837,84	984.064,69	103,36	10,62			27,89		
					88,61			1.734,45	73,84														88,61	25.066,21		236,80	23.874,82
106.980,00	10,68			207,44						46.694,02	-	-	43.491,66	13.015,94		38.911,68	-	-	38.911,68	982.404,08	73,84	10,68			29,05		
					185,62			3.868,77	154,68														185,62	25.251,83		394,70	24.269,52
106.997,48	10,47			231,99						46.879,64	-	-	47.257,87	13.118,50		39.066,37	-	-	39.066,37	978.690,00	154,69	10,47			17,01		
					26,40			583,16	22,00														26,40	25.278,23		42,39	24.311,91
107.000,00	10,47			230,53						46.906,04	-	-	47.826,23	13.133,30		39.088,37	-	-	39.088,37	978.128,84	22,00	10,47			16,61		
					209,40			4.579,67	174,50														209,40	25.487,63		335,97	24.647,88
107.020,00	10,37			223,96						47.115,44	-	-	52.288,54	13.250,66		39.262,87	-	-	39.262,87	973.723,67	174,50	10,37			17,63		
					33,80			729,71	28,17														33,80	25.521,43		56,11	24.703,99
107.023,28	10,27			221,63						47.149,24	-	-	52.999,04	13.269,87		39.291,03	-	-	39.291,03	973.022,12	28,16	10,27			16,63		
					171,05			3.617,96	142,54														171,05	25.692,48		290,33	24.994,32
107.040,00	10,18			211,02						47.320,29	-	-	56.518,85	13.368,02		39.433,58	-	-	39.433,58	969.546,71	142,55	10,18			18,09		
					199,74			4.081,02	166,45														199,74	25.892,22		343,63	25.337,95
107.060,00	9,79			197,08						47.520,03	-	-	60.482,51	13.485,38		39.600,02	-	-	39.600,02	965.632,13	166,44	9,79			16,28		
					193,80			3.747,90	161,50														193,80	26.086,02		504,98	25.842,93
107.080,00	9,59			177,71						47.713,83	-	-	64.113,05	13.602,74		39.761,52	-	-	39.761,52	962.045,73	161,50	9,59			34,22		
					214,70			3.325,00	178,92														214,70	26.300,72		834,42	26.677,35
107.100,00	11,88			154,79						47.928,53	-	-	67.320,69	13.720,10		39.940,44	-	-	39.940,44	958.899,65	178,92	11,88			49,22		
					236,09			3.009,63	196,74														236,09	26.536,81		990,92	27.668,27
107.120,00	11,73			146,17						48.164,62	-	-	70.212,96	13.837,46		40.137,18	-	-	40.137,18	956.086,76	196,74	11,73			49,87		
					232,50			2.686,39	193,75														232,50	26.769,31		1.023,99	28.692,26
107.140,00	11,52			122,47						48.397,12	-	-	72.781,99	13.954,82		40.330,93	-	-	40.330,93	953.594,12	193,75	11,52			52,53		
					26,78			283,46	22,32														26,78	26.796,09		124,25	28.816,51
107.142,35	11,32			119,33						48.423,90	-	-	73.051,69	13.968,58		40.353,25	-	-	40.353,25	953.332,98	22,32	11,32			53,46		
					197,63			1.936,59	164,69														197,63	26.993,72		926,03	29.742,54
107.160,00	11,09			102,40						48.621,53	-	-	74.884,68	14.072,18		40.517,94	-	-	40.517,94	951.561,08	164,69	11,09			51,08		
					88,57			792,15	73,81														88,57	27.082,29		497,62	30.240,16
107.168,14	10,67			92,20						48.710,10	-	-	75.629,06	14.119,95		40.591,75	-	-	40.591,75	950.842,74	73,81	10,67			71,16		
					126,43			1.049,41	105,36														126,43	27.208,72		915,84	31.156,00
107.180,00	10,65			84,79						48.836,53	-	-	76.608,88	14.189,54		40.697,11	-	-	40.697,11	949.898,69	105,36	10,65			83,30		
					147,25			1.131,92	122,71														147,25	27.355,97		914,95	32.070,95
107.193,94	10,47			77,63						48.983,78	-	-	77.659,01	14.271,33		40.819,82	-	-	40.819,82	948.889,48	122,71	10,47			47,98		
					64,12			460,20	53,43														63,98	27.419,95		287,02	32.357,97
107.200,00	10,68			74,22						49.047,90	-	-	78.083,64	14.306,90		40.873,25	-	-	40.873,25	948.482,71	53,43	10,64			46,72		
					208,05			1.552,82	173,38														200,68	27.620,63		957,12	33.315,09
107.220,00	10,12			81,07						49.255,95	-	-	79.519,10	14.424,26		41.046,62	-	-	41.046,62	947.103,26	173,37	9,43			48,99		
					212,70			1.521,95	177,25														186,63	27.807,26		980,82	34.295,91
107.240,00	11,15			71,13						49.468,65	-	-	80.923,69	14.541,62		41.223,88	-	-	41.223,88	945.758,57	177,26	9,23			49,09		
					232,25			1.342,56	193,54														184,63	27.991,89		958,82	35.254,73
107.260,00	12,08			63,13						49.700,90	-	-	82.148,89	14.658,98		41.417,42	-	-	41.417,42	944.609,55	193,54	9,23			46,79		
					251,68			1.137,69	209,73														182,62	28.174,51		940,27	36.195,00
107.280,00	13,09			50,64						49.952,58	-	-	83.169,22	14.776,34		41.627,15	-	-	41.627,15	943.681,59	209,73	9,03			47,23		
					267,47			877,70	222,89														178,61	28.353,12		909,91	37.104,91
107.300,00	13,66			37,13						50.220,05	-	-	83.929,56	14.893,70		41.850,04	-	-	41.850,04	943.026,78	222,89	8,83			43,76		
					272,43			696,96	227,03														174,65	28.527,77		854,58	37.959,49
107.320,00	13,59			32,57						50.492,48	-	-	84.509,16	15.011,06		42.077,07	-	-	42.077,07	942.556,85	227,03	8,63			41,70		
					273,97			561,42	228,31														169,14	28.696,91		817,37	38.776,86
107.340,00	13,81			23,57						50.766,45	-	-	84.953,22	15.128,42		42.305,38	-	-	42.305,38	942.223,74	228,31	8,28			40,04		
					158,22			245,59	131,85														92,92	28.789,83		458,53	39.235,39
107.351,33	14,13			19,79						50.924,67	-	-	85.132,35	15.194,88		42.437,22	-	-	42.437,22	942.109,99	131,84	8,13			40,93		
					77,67			110,55	64,73														44,79	28.834,62		219,39	39.454,78
107.356,87	13,89			20,08						51.002,34	-	-	85.210,36	15.227,42		42.501,95	-	-	42.501,95	942.064,17	64,73	8,03			38,20		
					43,43			64,34	36,19														25,11	28.859,73		119,41	39.574,19
107.360,00	13,88			21,05						51.045,77	-	-	85.256,34	15.245,78		42.538,14	-	-	42.538,14	942.036,02	36,19	8,03			38,13		
					33,62			52,73	28,02														19,39	28.879,12		92,25	39.666,44
107.362,42	13,95			22,60						51.079,39	-	-	85.294,90	15.259,95		42.566,16	-	-	42.566,16	942.011,31	28,02	8,03			38,23		
					237,22			427,96	197,68														141,14	29.020,26		671,61	40.338,05
107.380,00	13,03			26,08						51.316,61	-	-	85.619,67	15.363,14		42.763,84	-	-	42.763,84	941.781,03	197,68	8,03			38,16		
					246,54			545,74	205,45														160,53	29.180,79		754,74	41.092,79
107.400,00	11,63			28,50						51.563,15	-	-	86.048,05	15.480,50		42.969,29	-	-	42.969,29	941.440,74	205,45	8,03			37,31		
					12,92			32,28	10,77														8,94	29.189,73		41,99	41.134,78
107.401,13	11,29			28,75						51.576,07	-	-	86.073,71	15.487,12		42.980,06	-	-	42.980,06	941.419,23	10,77	7,83			37,16		
					82,03			215,06	68,36														58,34	29.248,07		265,04	41.399,82
107.408,49	11,00			29,70						51.658,10	-	-	86.245,59	15.530,30		43.048,42	-	-	43.048,42	941.272,53	68,36	8,03			34,87		
					79,24			194,73	66,03														58,34	29.306,41		254,93	41.654,75
107.415,85	10,53			23,22						51.737,34	-	-	86.397,13	15.573,49		43.114,45	-	-	43.114,45	941.143,83	66,03	7,83			34,41		
					42,75			69,28	35,63														31,25	29.337,66		143,05	41.797,80
107.420,00	10,05			10,14						51.780,09	-	-	86.442,04	15.597,86		43.150,08	-	-	43.150,08	941.110,18	35,63	7,22			34,48		
					185,52			229,50	154,60														130,45	29.468,11		507,33	42.305,13
107.440,00	8,50			12,81						51.965,61	-	-	86.554,18	15.715,22		43.304,68	-	-	43.304,68	941.035,28	154,60	5,82			16,25		
					148,84			284,82	124,03														118,41	29.586,52		376,76	42.681,89
107.460,00	6,39			15,67						52.114,45	-	-	86.721,64	15.832,58		43.428,71	-	-	43.428,71	940.874,49	124,03	6,02			21,42		
					122,06			364,75	101,72														118,41	29.704,93		430,25	43.112,14
107.480,00	5,82			20,80						52.236,51	-	-	86.969,03	15.949,94		43.530,42	-	-	43.530,42	940.611,45	101,71	5,82			21,60		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					118,41			471,56	98,68														118,41	29.823,34		423,53	43.535,67
107.500,00	6,02			26,35						52.354,92	-	-	87.323,23	16.067,30		43.629,10	-	-	43.629,10	940.238,57	98,68	6,02			20,75		
					130,45			607,24	108,71														130,45	29.953,79		504,46	44.040,13
107.520,00	7,02			34,37						52.485,37	-	-	87.813,11	16.184,66		43.737,81	-	-	43.737,81	939.740,04	108,71	7,02			29,70		
					146,50			816,41	122,08														146,50	30.100,29		709,53	44.749,66
107.540,00	7,63			47,27						52.631,87	-	-	88.512,16	16.302,02		43.859,89	-	-	43.859,89	939.045,71	122,08	7,63			41,26		
					160,55			1.089,89	133,79														160,55	30.260,84		815,36	45.565,02
107.560,00	8,43			61,72						52.792,42	-	-	89.484,69	16.419,38		43.993,68	-	-	43.993,68	938.089,61	133,79	8,43			40,28		
					170,58			1.354,45	142,15														170,58	30.431,42		816,34	46.381,36
107.580,00	8,63			73,73						52.963,00	-	-	90.721,78	16.536,74		44.135,83	-	-	44.135,83	936.877,31	142,15	8,63			41,35		
					172,59			1.548,67	143,83														172,59	30.604,01		795,19	47.176,55
107.600,00	8,63			81,14						53.135,59	-	-	92.153,09	16.654,10		44.279,66	-	-	44.279,66	935.472,47	143,83	8,63			38,17		
					174,60			1.663,11	145,50														174,60	30.778,61		746,85	47.923,40
107.620,00	8,83			85,17						53.310,19	-	-	93.698,84	16.771,46		44.425,16	-	-	44.425,16	933.954,86	145,50	8,83			36,52		
					180,62			1.817,09	150,52														180,62	30.959,23		714,19	48.637,59
107.640,00	9,23			96,54						53.490,81	-	-	95.398,57	16.888,82		44.575,68	-	-	44.575,68	932.288,29	150,52	9,23			34,90		
					190,65			1.953,01	158,88														190,65	31.149,88		763,02	49.400,61
107.660,00	9,83			98,76						53.681,46	-	-	97.234,22	17.006,18		44.734,55	-	-	44.734,55	930.494,15	158,87	9,83			41,40		
					202,00			1.965,33	168,33														202,00	31.351,88		975,43	50.376,04
107.680,00	10,37			97,77						53.883,46	-	-	99.082,19	17.123,54		44.902,88	-	-	44.902,88	928.697,15	168,33	10,37			56,14		
					206,01			2.026,13	171,68														206,01	31.557,89		1.165,75	51.541,79
107.700,00	10,24			104,84						54.089,47	-	-	100.990,96	17.240,90		45.074,56	-	-	45.074,56	926.842,70	171,68	10,24			60,43		
					205,40			1.918,84	171,17														205,40	31.763,29		1.149,61	52.691,40
107.720,00	10,30			87,04						54.294,87	-	-	102.792,44	17.358,26		45.245,73	-	-	45.245,73	925.095,03	171,17	10,30			54,53		
					15,05			125,26	12,54														15,05	31.778,34		78,70	52.770,10
107.721,46	10,28			84,29						54.309,92	-	-	102.909,12	17.366,84		45.258,27	-	-	45.258,27	924.982,31	12,54	10,28			53,11		
					54,98			410,84	45,82														54,98	31.833,32		291,42	53.061,52
107.726,83	10,19			68,67						54.364,90	-	-	103.288,44	17.398,36		45.304,08	-	-	45.304,08	924.617,28	45,81	10,19			55,39		
					55,04			380,56	45,87														55,04	31.888,36		321,45	53.382,97
107.732,21	10,30			73,02						54.419,94	-	-	103.637,48	17.429,88		45.349,95	-	-	45.349,95	924.282,59	45,87	10,30			64,29		
					79,81			547,90	66,51														79,81	31.968,17		471,79	53.854,76
107.740,00	10,17			67,56						54.499,75	-	-	104.139,64	17.475,62		45.416,46	-	-	45.416,46	923.801,20	66,51	10,17			56,76		
					190,16			1.232,99	158,47														190,16	32.158,33		846,18	54.700,94
107.760,00	8,84			55,74						54.689,91	-	-	105.255,27	17.592,98		45.574,92	-	-	45.574,92	922.726,67	158,46	8,84			27,86		
					158,65			1.075,43	132,21														158,65	32.316,98		384,77	55.085,71
107.780,00	7,02			51,81						54.848,56	-	-	106.213,34	17.710,34		45.707,13	-	-	45.707,13	921.783,45	132,21	7,02			10,62		
					140,47			1.050,75	117,06														140,47	32.457,45		385,31	55.471,02
107.800,00	7,02			53,27						54.989,03	-	-	107.146,73	17.827,70		45.824,19	-	-	45.824,19	920.849,76	117,06	7,02			27,91		
					122,47			915,71	102,06														122,47	32.579,92		488,70	55.959,72
107.817,44	7,02			51,77						55.111,50	-	-	107.960,13	17.930,01		45.926,25	-	-	45.926,25	920.036,11	102,06	7,02			28,14		
					18,00			132,67	15,00														18,00	32.597,92		72,60	56.032,32
107.820,00	7,02			51,72						55.129,50	-	-	108.077,75	17.945,06		45.941,25	-	-	45.941,25	919.918,44	15,00	7,02			28,49		
					69,45			508,61	57,88														69,45	32.667,37		276,22	56.308,54
107.829,68	7,21			52,07						55.198,95	-	-	108.529,58	18.001,84		45.999,12	-	-	45.999,12	919.467,70	57,87	7,21			28,63		
					77,08			561,14	64,23														77,08	32.744,45		311,79	56.620,33
107.840,00	7,60			55,25						55.276,03	-	-	109.030,14	18.062,42		46.063,36	-	-	46.063,36	918.970,80	64,24	7,60			31,92		
					14,64			107,05	12,20														14,64	32.759,09		61,69	56.682,02
107.841,92	7,68			56,42						55.290,67	-	-	109.125,94	18.073,67		46.075,56	-	-	46.075,56	918.875,95	12,20	7,68			32,43		
					148,97			1.191,83	124,14														148,97	32.908,06		576,35	57.258,37
107.860,00	8,80			75,40						55.439,64	-	-	110.211,66	18.179,78		46.199,70	-	-	46.199,70	917.808,26	124,14	8,80			31,31		
					67,80			574,10	56,50														67,80	32.975,86		231,59	57.489,96
107.867,72	8,76			73,31						55.507,44	-	-	110.740,46	18.225,08		46.256,20	-	-	46.256,20	917.290,66	56,50	8,76			28,68		
					105,40			901,92	87,83														105,40	33.081,26		353,19	57.843,15
107.879,96	8,61			75,58						55.612,84	-	-	111.570,55	18.296,91		46.344,03	-	-	46.344,03	916.476,57	87,83	8,61			29,18		
					0,33			2,90	0,28														0,33	33.081,59		1,12	57.844,27
107.880,00	8,61			75,59						55.613,17	-	-	111.573,22	18.297,14		46.344,31	-	-	46.344,31	916.473,95	0,28	8,61			29,18		
					104,19			918,88	86,83														104,19	33.185,78		338,65	58.182,92
107.892,20	8,63			76,68						55.717,36	-	-	112.420,50	18.368,74		46.431,13	-	-	46.431,13	915.641,89	86,82	8,63			26,65		
					67,29			595,08	56,08														67,29	33.253,07		211,00	58.393,92
107.900,00	8,63			75,95						55.784,65	-	-	112.969,82	18.414,50		46.487,21	-	-	46.487,21	915.102,89	56,08	8,63			27,46		
					172,58			1.539,92	143,82														172,58	33.425,65		571,92	58.965,84
107.920,00	8,63			78,04						55.957,23	-	-	114.392,38	18.531,86		46.631,02	-	-	46.631,02	913.706,78	143,81	8,63			29,73		
					170,58			1.477,95	142,15														170,58	33.596,23		558,58	59.524,42
107.940,00	8,43			69,75						56.127,81	-	-	115.752,97	18.649,22		46.773,18	-	-	46.773,18	912.370,99	142,16	8,43			26,13		
					168,57			1.377,48	140,48														168,57	33.764,80		508,39	60.032,81
107.960,00	8,43			67,99						56.296,38	-	-	117.013,09	18.766,58		46.913,65	-	-	46.913,65	911.133,98	140,47	8,43			24,71		
					166,56			1.317,25	138,80														166,56	33.931,36		509,28	60.542,09
107.980,00	8,23			63,73						56.462,94	-	-	118.212,98	18.883,94		47.052,45	-	-	47.052,45	909.955,53	138,80	8,23			26,22		
					164,50			1.160,15	137,08														164,50	34.095,86		545,79	61.087,88
108.000,00	8,22			52,28						56.627,44	-	-	119.255,77	19.001,30		47.189,53	-	-	47.189,53	908.932,46	137,08	8,22			28,36		
					151,87			879,06	126,56														151,87	34.247,73		501,73	61.589,61
108.018,72	8,00			41,64						56.779,31	-	-	120.025,00	19.111,13		47.316,09	-	-	47.316,09	908.179,96	126,56	8,00			25,25		
					10,22			53,30	8,52														10,22	34.257,95		30,99	61.620,60
108.020,00	7,94			41,50						56.789,53	-	-	120.070,77	19.118,66		47.324,61	-	-	47.324,61	908.135,18	8,52	7,94			23,09		
					158,73			739,37	132,28														158,73	34.416,68		496,00	62.116,60
108.040,00	7,99			32,59						56.948,26	-	-	120.692,78	19.236,02		47.456,88	-	-	47.456,88	907.528,08	132,27	7,99			26,64		
					6,32			25,04	5,27														6,32	34.423,00		19,76	62.136,36
108.040,80	7,90			30,35						56.954,58	-	-	120.713,16	19.240,68		47.462,15	-	-	47.462,15	907.508,31	5,27	7,90			23,03		
					139,21			496,51	116,01														139,21	34.562,21		401,56	62.537,92
108.060,00	6,66			21,58						57.093,79	-	-	121.096,97	19.353,38		47.578,16	-	-	47.578,16	907.127,81	116,01	6,66			18,99		
					18,85			61,81	15,71														18,85	34.581,06		54,83	62.592,75
108.062,87	6,46			21,45						57.112,64	-	-	121.141,92	19.370,24		47.593,87	-	-	47.593,87	907.081,71	15,71	6,46			19,18		

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)							
					111,09			360,89	92,58													110,66	34.691,72		335,43	62.928,18
108.080,00	6,51			20,70						57.223,73	-	-	121.402,31	19.470,74	47.686,44	-	-	47.686,44	906.813,39	92,57	6,46			19,99		
					83,84			259,59	69,87													82,85	34.774,57		277,67	63.205,85
108.093,03	6,36			19,16						57.307,57	-	-	121.585,45	19.547,19	47.756,31	-	-	47.756,31	906.623,67	69,87	6,26			22,64		
					43,71			128,20	36,43													42,91	34.817,48		153,94	63.359,79
108.100,00	6,18			17,62						57.351,28	-	-	121.672,74	19.588,10	47.792,73	-	-	47.792,73	906.531,89	36,42	6,05			21,52		
					93,53			246,02	77,94													90,33	34.907,81		275,62	63.635,41
108.115,11	6,13			14,70						57.444,81	-	-	121.830,13	19.676,73	47.870,68	-	-	47.870,68	906.363,82	77,95	5,84			14,81		
					29,89			71,30	24,91													28,55	34.936,36		68,68	63.704,09
108.120,00	6,09			14,44						57.474,70	-	-	121.872,70	19.705,46	47.895,58	-	-	47.895,58	906.317,42	24,90	5,83			13,25		
					103,17			249,74	85,98													98,90	35.035,26		228,60	63.932,69
108.137,18	5,86			14,40						57.577,87	-	-	122.021,61	19.806,29	47.981,56	-	-	47.981,56	906.153,66	85,98	5,62			13,20		
					16,57			40,62	13,81													15,83	35.051,09		37,10	63.969,79
108.140,00	5,90			14,44						57.594,44	-	-	122.045,70	19.822,82	47.995,37	-	-	47.995,37	906.126,85	13,81	5,62			13,14		
					119,66			289,56	99,72													114,39	35.165,48		265,19	64.234,98
108.160,00	6,06			14,51						57.714,10	-	-	122.217,90	19.940,18	48.095,08	-	-	48.095,08	905.937,00	99,71	5,82			13,37		
					120,04			275,92	100,03													114,39	35.279,87		257,19	64.492,17
108.180,00	5,94			13,08						57.834,14	-	-	122.376,46	20.057,54	48.195,12	-	-	48.195,12	905.761,12	100,04	5,62			12,34		
					118,97			232,57	99,14													110,37	35.390,24		239,59	64.731,76
108.200,00	5,96			10,18						57.953,11	-	-	122.491,67	20.174,90	48.294,26	-	-	48.294,26	905.627,69	99,14	5,42			11,61		
					117,39			176,40	97,83													106,36	35.496,60		239,07	64.970,83
108.220,00	5,78			7,46						58.070,50	-	-	122.550,71	20.292,26	48.392,08	-	-	48.392,08	905.549,11	97,82	5,22			12,29		
					161,86			172,13	134,88													143,79	35.640,39		244,48	65.215,31
108.240,00	10,41			9,75						58.232,36	-	-	122.605,48	20.409,62	48.526,97	-	-	48.526,97	905.511,87	134,89	9,16			12,16		
					205,28			155,34	155,34													173,89	35.814,28		398,55	65.613,86
108.260,00	10,12			5,78						58.437,64	-	-	122.643,46	20.526,98	48.698,03	-	-	48.698,03	905.527,59	171,06	8,23			27,70		
					195,16			86,35	86,35													150,51	35.964,79		514,11	66.127,97
108.280,00	9,39			2,85						58.632,80	-	-	122.643,51	20.613,28	48.860,67	-	-	48.860,67	905.603,88	162,64	6,82			23,71		
					212,16			49,54	49,54													128,43	36.093,22		300,94	66.428,91
108.300,00	11,82			2,10						58.844,96	-	-	122.643,55	20.662,78	49.037,47	-	-	49.037,47	905.731,14	176,80	6,02			6,38		
					212,47			35,63	35,63													112,38	36.205,60		123,59	66.552,50
108.320,00	9,42			1,46						59.057,43	-	-	122.643,58	20.698,38	49.214,52	-	-	49.214,52	905.872,56	177,05	5,22			5,98		
					191,09			16,99	16,99													102,35	36.307,95		59,75	66.612,25
108.340,00	9,68			0,24						59.248,52	-	-	122.643,57	20.715,38	49.373,77	-	-	49.373,77	906.014,82	159,25	5,02			-		
					197,02			4,85	4,85													100,34	36.408,29		-	66.612,25
108.360,00	10,02			0,25						59.445,54	-	-	122.643,52	20.720,28	49.537,95	-	-	49.537,95	906.174,15	164,18	5,02			-		
					207,26			2,46	2,46													100,34	36.508,63		-	66.612,25
108.380,00	10,71			-						59.652,80	-	-	122.643,48	20.722,78	49.710,67	-	-	49.710,67	906.344,41	172,72	5,02			-		
					219,10			-	-													100,34	36.608,97		-	66.612,25
108.400,00	11,20			-						59.871,90	-	-	122.643,48	20.722,78	49.893,25	-	-	49.893,25	906.526,99	182,58	5,02			-		
					232,27			-	-													102,35	36.711,32		-	66.612,25
108.420,00	12,03			-						60.104,17	-	-	122.643,48	20.722,78	50.086,81	-	-	50.086,81	906.720,55	193,56	5,22			-		
					254,52			-	-													104,35	36.815,67		-	66.612,25
108.440,00	13,43			-						60.358,69	-	-	122.643,48	20.722,78	50.298,91	-	-	50.298,91	906.932,65	212,10	5,22			-		
					285,32			-	-													106,36	36.922,03		-	66.612,25
108.460,00	15,11			-						60.644,01	-	-	122.643,48	20.722,78	50.536,68	-	-	50.536,68	907.170,42	237,77	5,42			-		
					336,91			-	-													108,37	37.030,40		-	66.612,25
108.480,00	18,58			-						60.980,92	-	-	122.643,48	20.722,78	50.817,43	-	-	50.817,43	907.451,17	280,75	5,42			-		
					385,89			-	-													110,37	37.140,77		-	66.612,25
108.500,00	20,00			-						61.366,81	-	-	122.643,48	20.722,78	51.139,01	-	-	51.139,01	907.772,75	321,58	5,62			-		
					368,48			-	-													114,39	37.255,16		-	66.612,25
108.520,00	16,84			-						61.735,29	-	-	122.643,48	20.722,78	51.446,08	-	-	51.446,08	908.079,82	307,07	5,82			-		
					346,58			-	-													112,38	37.367,54		-	66.612,25
108.540,00	17,81			-						62.081,87	-	-	122.643,48	20.722,78	51.734,89	-	-	51.734,89	908.368,63	288,81	5,42			-		
					338,28			-	-													106,36	37.473,90		-	66.612,25
108.560,00	16,01			-						62.420,15	-	-	122.643,48	20.722,78	52.016,79	-	-	52.016,79	908.650,53	281,90	5,22			-		
					291,48			-	-													102,35	37.576,25		-	66.612,25
108.580,00	13,13			-						62.711,63	-	-	122.643,48	20.722,78	52.259,69	-	-	52.259,69	908.893,43	242,90	5,02			-		
					201,18			0,17	0,17													86,29	37.662,54		-	66.612,25
108.600,00	6,98			0,02						62.912,81	-	-	122.643,45	20.722,98	52.427,34	-	-	52.427,34	909.060,91	167,65	3,61			-		
					39,21			0,05	0,05													20,59	37.683,13		-	66.612,25
108.605,70	6,78			-						62.952,02	-	-	122.643,45	20.723,03	52.460,02	-	-	52.460,02	909.093,54	32,68	3,61			-		
					33,16			0,14	0,14													18,04	37.701,17		-	66.612,25
108.610,69	6,51			0,06						62.985,18	-	-	122.643,44	20.723,18	52.487,65	-	-	52.487,65	909.121,03	27,63	3,61			-		
					32,27			0,34	0,34													18,05	37.719,22		-	66.612,25
108.615,69	6,42			0,08						63.017,45	-	-	122.643,43	20.723,53	52.514,54	-	-	52.514,54	909.147,58	26,89	3,62			-		
					26,79			0,48	0,48													15,16	37.734,38		-	66.612,25
108.620,00	6,00			0,14						63.044,24	-	-	122.643,43	20.724,01	52.536,87	-	-	52.536,87	909.169,43	22,33	3,42			-		
					136,87			1,42	1,42													68,31	37.802,69		-	66.612,25
108.640,00	7,68			-						63.181,11	-	-	122.643,45	20.725,41	52.650,92	-	-	52.650,92	909.282,06	114,05	3,42			-		
					88,09			-	-													38,45	37.841,14		-	66.612,25
108.651,26	7,96			-						63.269,20	-	-	122.643,45	20.725,41	52.724,33	-	-	52.724,33	909.355,47	73,41	3,42			-		
					57,57			-	-													24,62	37.865,76		-	66.612,25
108.658,53	8,01			-						63.326,77	-	-	122.643,45	20.725,41	52.772,31	-	-	52.772,31	909.403,45	47,98	3,43			-		
					11,88			-	-													5,05	37.870,81		-	66.612,25
108.660,00	8,12			-						63.338,65	-	-	122.643,45	20.725,41	52.782,21	-	-	52.782,21	909.413,35	9,90	3,43			-		
					50,06			-	-													20,29	37.891,10		-	66.612,25
108.665,80	9,34			-						63.388,71	-	-	122.643,45	20.725,41	52.823,92	-	-	52.823,92	909.455,06	41,71	3,65			-		
					147,96			-	-													50,40	37.941,50		-	66.612,25
108.680,00	11,49			-						63.536,67	-	-	122.643,45	20.725,41	52.947,22	-	-	52.947,22	909.578,36	123,30	3,45			-		
					144,48			-	-													40,13	37.981,63		-	66.612,25
108.690,99	14,79			-						63.681,15	-	-	122.643,45	20.725,41	53.067,62	-	-	53.067,62	909.698,76	120,40	3,85			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					127,08			-	-														33,36	38.014,99		-	66.612,25
108.699,33	15,06			-						63.808,23	-	-	122.643,45	20.725,41		53.173,52	-	-	53.173,52	909.804,66	105,90	4,03			-		
					10,14			-	-														2,71	38.017,70		-	66.612,25
108.700,00	15,08			-						63.818,37	-	-	122.643,45	20.725,41		53.181,98	-	-	53.181,98	909.813,12	8,46	4,03			-		
					115,39			-	-														31,31	38.049,01		-	66.612,25
108.707,66	14,41			-						63.933,76	-	-	122.643,45	20.725,41		53.278,13	-	-	53.278,13	909.909,27	96,15	4,01			-		
					174,40			-	-														49,52	38.098,53		-	66.612,25
108.720,00	13,86			-						64.108,16	-	-	122.643,45	20.725,41		53.423,47	-	-	53.423,47	910.054,61	145,34	4,01			-		
					270,58			-	-														78,27	38.176,80		-	66.612,25
108.740,00	13,20			-						64.378,74	-	-	122.643,45	20.725,41		53.648,95	-	-	53.648,95	910.280,09	225,48	3,81			-		
					248,29			-	-														76,26	38.253,06		-	66.612,25
108.760,00	11,63			-						64.627,03	-	-	122.643,45	20.725,41		53.855,86	-	-	53.855,86	910.487,00	206,91	3,81			-		
					212,86			-	-														76,26	38.329,32		-	66.612,25
108.780,00	9,66			-						64.839,89	-	-	122.643,45	20.725,41		54.033,24	-	-	54.033,24	910.664,38	177,38	3,81			-		
					175,19			0,59	0,59														76,26	38.405,58		-	66.612,25
108.800,00	7,86			0,06						65.015,08	-	-	122.643,44	20.726,01		54.179,23	-	-	54.179,23	910.809,78	145,99	3,81			-		
					147,75			2,10	2,10														76,26	38.481,84		-	66.612,25
108.820,00	6,92			0,15						65.162,83	-	-	122.643,44	20.728,11		54.302,36	-	-	54.302,36	910.930,81	123,13	3,81			-		
					145,52			2,06	2,06														76,26	38.558,10		-	66.612,25
108.840,00	7,64			0,05						65.308,35	-	-	122.643,50	20.730,11		54.423,62	-	-	54.423,62	911.050,01	121,26	3,81			-		
					140,86			2,75	2,75														76,26	38.634,36		-	66.612,25
108.860,00	6,45			0,22						65.449,21	-	-	122.643,55	20.732,81		54.541,01	-	-	54.541,01	911.164,65	117,39	3,81			-		
					111,91			8,61	8,61														76,26	38.710,62		-	66.612,25
108.880,00	4,74			0,64						65.561,12	-	-	122.643,56	20.741,41		54.634,27	-	-	54.634,27	911.249,30	93,26	3,81			-		
					127,01			6,41	6,41														76,26	38.786,88		-	66.612,25
108.900,00	7,96			-						65.688,13	-	-	122.643,57	20.747,81		54.740,11	-	-	54.740,11	911.348,73	105,84	3,81			-		
					143,44			-	-														75,38	38.862,26		-	66.612,25
108.920,00	6,38			-						65.831,57	-	-	122.643,57	20.747,81		54.859,64	-	-	54.859,64	911.468,26	119,53	3,72			-		
					126,51			-	-														75,39	38.937,65		-	66.612,25
108.940,00	6,27			-						65.958,08	-	-	122.643,57	20.747,81		54.965,07	-	-	54.965,07	911.573,69	105,43	3,81			-		
					138,82			-	-														76,47	39.014,12		-	66.612,25
108.960,00	7,62			-						66.096,90	-	-	122.643,57	20.747,81		55.080,75	-	-	55.080,75	911.689,37	115,68	3,83			-		
					141,57			-	-														74,42	39.088,54		-	66.612,25
108.980,00	6,54			-						66.238,47	-	-	122.643,57	20.747,81		55.198,73	-	-	55.198,73	911.807,35	117,98	3,61			-		
					124,45			0,62	0,62														75,25	39.163,79		-	66.612,25
109.000,00	5,90			0,06						66.362,92	-	-	122.643,59	20.748,41		55.302,43	-	-	55.302,43	911.910,43	103,70	3,92			-		
					144,40			0,62	0,62														77,28	39.241,07		-	66.612,25
109.020,00	8,54			-						66.507,32	-	-	122.643,61	20.749,01		55.422,77	-	-	55.422,77	912.030,15	120,34	3,81			-		
					144,81			29,02	29,02														76,26	39.317,33		-	66.612,25
109.040,00	5,95			2,90						66.652,13	-	-	122.643,63	20.778,01		55.543,44	-	-	55.543,44	912.121,80	120,67	3,81			-		
					111,20			29,93	29,93														76,26	39.393,59		-	66.612,25
109.060,00	5,18			0,09						66.763,33	-	-	122.643,66	20.807,91		55.636,11	-	-	55.636,11	912.184,54	92,67	3,81			-		
					98,79			9,45	9,45														76,26	39.469,85		-	66.612,25
109.080,00	4,70			0,85						66.862,12	-	-	122.643,71	20.817,31		55.718,43	-	-	55.718,43	912.257,41	82,32	3,81			-		
					88,89			18,48	18,48														74,25	39.544,10		-	66.612,25
109.100,00	4,19			0,99						66.951,01	-	-	122.643,79	20.835,71		55.792,51	-	-	55.792,51	912.313,01	74,08	3,61			-		
					85,90			20,52	20,52														74,25	39.618,35		-	66.612,25
109.120,00	4,40			1,06						67.036,91	-	-	122.643,81	20.856,21		55.864,09	-	-	55.864,09	912.364,07	71,58	3,81			-		
					89,34			16,95	16,95														76,26	39.694,61		-	66.612,25
109.140,00	4,53			0,64						67.126,25	-	-	122.643,76	20.873,21		55.938,54	-	-	55.938,54	912.421,57	74,45	3,81			-		
					90,16			14,95	14,95														76,26	39.770,87		-	66.612,25
109.160,00	4,49			0,86						67.216,41	-	-	122.643,71	20.888,21		56.013,68	-	-	56.013,68	912.481,76	75,14	3,81			-		
					89,40			19,16	19,16														76,26	39.847,13		-	66.612,25
109.180,00	4,45			1,06						67.305,81	-	-	122.643,67	20.907,41		56.088,18	-	-	56.088,18	912.537,10	74,50	3,81			-		
					88,30			31,08	31,08														76,26	39.923,39		-	66.612,25
109.200,00	4,38			2,05						67.394,11	-	-	122.643,65	20.938,51		56.161,76	-	-	56.161,76	912.579,60	73,58	3,81			-		
					91,16			43,11	43,11														78,27	40.001,66		-	66.612,25
109.220,00	4,74			2,26						67.485,27	-	-	122.643,66	20.981,61		56.237,73	-	-	56.237,73	912.612,46	75,97	4,01			-		
					92,89			42,19	42,19														78,27	40.079,93		-	66.612,25
109.240,00	4,55			1,96						67.578,16	-	-	122.643,65	21.023,81		56.315,13	-	-	56.315,13	912.647,67	77,40	3,81			-		
					87,13			32,14	32,14														76,26	40.156,19		-	66.612,25
109.260,00	4,16			1,26						67.665,29	-	-	122.643,59	21.056,01		56.387,74	-	-	56.387,74	912.688,14	72,61	3,81			-		
					96,75			27,43	27,43														80,27	40.236,46		-	66.612,25
109.280,00	5,51			1,49						67.762,04	-	-	122.643,52	21.083,51		56.468,37	-	-	56.468,37	912.741,34	80,63	4,21			-		
					116,03			35,26	35,26														84,29	40.320,75		-	66.612,25
109.300,00	6,09			2,04						67.878,07	-	-	122.643,48	21.118,81		56.565,06	-	-	56.565,06	912.802,77	96,69	4,21			-		
					110,61			46,06	46,06														84,29	40.405,04		-	66.612,25
109.320,00	4,97			2,57						67.988,68	-	-	122.643,44	21.164,91		56.657,23	-	-	56.657,23	912.848,88	92,17	4,21			-		
					109,78			41,19	41,19														86,29	40.491,33		-	66.612,25
109.340,00	6,01			1,55						68.098,46	-	-	122.643,43	21.206,11		56.748,72	-	-	56.748,72	912.899,18	91,49	4,42			-		
					121,55			26,78	26,78														86,29	40.577,62		-	66.612,25
109.360,00	6,15			1,13						68.220,01	-	-	122.643,41	21.232,91		56.850,01	-	-	56.850,01	912.973,69	101,29	4,21			-		
					137,98			10,24	10,24														78,54	40.656,16		-	66.612,25
109.378,20	9,01			-						68.357,99	-	-	122.643,37	21.243,19		56.964,99	-	-	56.964,99	913.078,43	114,98	4,42			-		
					16,23			-	-														7,94	40.664,10		-	66.612,25
109.380,00	9,04			-						68.374,22	-	-	122.643,37	21.243,19		56.978,52	-	-	56.978,52	913.091,96	13,53	4,41			-		
					27,61			-	-														13,28	40.677,38		-	66.612,25
109.382,94	9,72			-						68.401,83	-	-	122.643,37	21.243,19		57.001,52	-	-	57.001,52	913.114,96	23,00	4,61			-		
					52,17			-	-														22,07	40.699,45		-	66.612,25
109.387,69	12,10			-						68.454,00	-	-	122.643,37	21.243,19		57.045,00	-	-	57.045,00	913.158,44	43,48	4,60			-		
					160,09			-	-														57,93	40.757,38		-	66.612,25
109.400,00	13,91			-						68.614,09	-	-	122.643,37	21.243,19		57.178,41	-	-	57.178,41	913.291,85	133,41	4,80			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9									
					194,71			-	-													64,91	40.822,29		-	66.612,25
109.413,23	15,52			-						68.808,80	-	-	122.643,37	21.243,19	57.340,67	-	-	57.340,67	913.454,11	162,26	5,00			-	
					35,36			-	-													11,47	40.833,76		-	66.612,25
109.415,48	15,95			-						68.844,16	-	-	122.643,37	21.243,19	57.370,13	-	-	57.370,13	913.483,57	29,46	5,21			-	
					36,25			-	-													11,70	40.845,46		-	66.612,25
109.417,73	16,31			-						68.880,41	-	-	122.643,37	21.243,19	57.400,34	-	-	57.400,34	913.513,78	30,21	5,21			-	
					37,65			-	-													11,83	40.857,29		-	66.612,25
109.420,00	16,84			-						68.918,06	-	-	122.643,37	21.243,19	57.431,72	-	-	57.431,72	913.545,16	31,38	5,21			-	
					385,39			-	-													108,17	40.965,46		-	66.612,25
109.440,00	21,70			-						69.303,45	-	-	122.643,37	21.243,19	57.752,88	-	-	57.752,88	913.866,32	321,16	5,61			-	
					483,38			-	-													114,18	41.079,64		-	66.612,25
109.460,00	26,64			-						69.786,83	-	-	122.643,37	21.243,19	58.155,69	-	-	58.155,69	914.269,13	402,81	5,81			-	
					548,84			-	-													118,18	41.197,82		-	66.612,25
109.480,00	28,25			-						70.335,67	-	-	122.643,37	21.243,19	58.613,06	-	-	58.613,06	914.726,50	457,37	6,01			-	
					569,72			-	-													118,18	41.316,00		-	66.612,25
109.500,00	28,72			-						70.905,39	-	-	122.643,37	21.243,19	59.087,82	-	-	59.087,82	915.201,26	474,76	5,81			-	
					641,17			-	-													128,20	41.444,20		-	66.612,25
109.520,00	35,39			-						71.546,56	-	-	122.643,37	21.243,19	59.622,13	-	-	59.622,13	915.735,57	534,31	7,01			-	
					655,46			-	-													132,21	41.576,41		-	66.612,25
109.540,00	30,15			-						72.202,02	-	-	122.643,37	21.243,19	60.168,35	-	-	60.168,35	916.281,79	546,22	6,21			-	
					176,45			-	-													39,04	41.615,45		-	66.612,25
109.546,29	25,98			-						72.378,47	-	-	122.643,37	21.243,19	60.315,39	-	-	60.315,39	916.428,83	147,04	6,21			-	
					115,58			-	-													28,23	41.643,68		-	66.612,25
109.550,69	26,50			-						72.494,05	-	-	122.643,37	21.243,19	60.411,71	-	-	60.411,71	916.525,15	96,32	6,61			-	
					113,49			-	-													27,33	41.671,01		-	66.612,25
109.555,10	25,04			-						72.607,54	-	-	122.643,37	21.243,19	60.506,28	-	-	60.506,28	916.619,72	94,57	5,80			-	
					118,80			-	-													28,46	41.699,47		-	66.612,25
109.560,00	23,41			-						72.726,34	-	-	122.643,37	21.243,19	60.605,28	-	-	60.605,28	916.718,72	99,00	5,80			-	
					418,70			-	-													112,08	41.811,55		-	66.612,25
109.580,00	18,46			-						73.145,04	-	-	122.643,37	21.243,19	60.954,20	-	-	60.954,20	917.067,64	348,92	5,40			-	
					6,72			-	-													1,98	41.813,53		-	66.612,25
109.580,37	18,31			-						73.151,76	-	-	122.643,37	21.243,19	60.959,80	-	-	60.959,80	917.073,24	5,60	5,40			-	
					85,54			-	-													26,30	41.839,83		-	66.612,25
109.585,15	17,45			-						73.237,30	-	-	122.643,37	21.243,19	61.031,08	-	-	61.031,08	917.144,52	71,28	5,59			-	
					92,27			-	-													27,27	41.867,10		-	66.612,25
109.589,93	21,12			-						73.329,57	-	-	122.643,37	21.243,19	61.107,98	-	-	61.107,98	917.221,42	76,90	5,81			-	
					186,09			-	-													55,46	41.922,56		-	66.612,25
109.600,00	15,85			-						73.515,66	-	-	122.643,37	21.243,19	61.263,05	-	-	61.263,05	917.376,49	155,07	5,21			-	
					317,93			-	-													102,17	42.024,73		-	66.612,25
109.620,00	15,94			-						73.833,59	-	-	122.643,37	21.243,19	61.527,99	-	-	61.527,99	917.641,43	264,94	5,01			-	
					159,44			-	-													50,08	42.074,81		-	66.612,25
109.640,00	-			-						73.993,03	-	-	122.643,37	21.243,19	61.660,86	-	-	61.660,86	917.774,30	132,87	-			-	
					-			-	-													-	42.074,81		-	66.612,25
109.660,00	-			-						73.993,03	-	-	122.643,37	21.243,19	61.660,86	-	-	61.660,86	917.774,30	-	-			-	
					115,52			3,45	3,45													54,09	42.128,90		-	66.612,25
109.680,00	11,55			0,34						74.108,55	-	-	122.643,42	21.246,59	61.757,13	-	-	61.757,13	917.867,12	96,27	5,41			-	
					62,41			2,22	2,22													29,76	42.158,66		-	66.612,25
109.685,50	11,14			0,46						74.170,96	-	-	122.643,44	21.248,79	61.809,13	-	-	61.809,13	917.916,90	52,00	5,41			-	
					47,63			2,53	2,53													23,56	42.182,22		-	66.612,25
109.689,86	10,74			0,70						74.218,59	-	-	122.643,44	21.251,32	61.848,82	-	-	61.848,82	917.954,06	39,69	5,41			-	
					45,03			3,07	3,07													23,12	42.205,34		-	66.612,25
109.694,21	9,94			0,71						74.263,62	-	-	122.643,44	21.254,39	61.886,35	-	-	61.886,35	917.988,52	37,53	5,21			-	
					57,09			4,56	4,56													30,14	42.235,48		-	66.612,25
109.700,00	9,78			0,87						74.320,71	-	-	122.643,43	21.258,96	61.933,93	-	-	61.933,93	918.031,54	47,58	5,21			-	
					155,80			20,32	20,32													97,27	42.332,75		-	66.612,25
109.720,00	5,80			1,16						74.476,51	-	-	122.643,45	21.279,26	62.063,76	-	-	62.063,76	918.141,05	129,83	4,52			-	
					144,78			28,19	28,19													99,28	42.432,03		-	66.612,25
109.740,00	8,68			1,65						74.621,29	-	-	122.643,54	21.307,36	62.184,41	-	-	62.184,41	918.233,51	120,65	5,41			-	
					157,68			26,22	26,22													102,16	42.534,19		-	66.612,25
109.760,00	7,09			0,97						74.778,97	-	-	122.643,56	21.333,56	62.315,81	-	-	62.315,81	918.338,69	131,40	4,81			-	
					155,63			16,36	16,36													96,15	42.630,34		-	66.612,25
109.780,00	8,48			0,67						74.934,60	-	-	122.643,52	21.349,96	62.445,50	-	-	62.445,50	918.452,02	129,69	4,81			-	
					174,34			12,50	12,50													100,16	42.730,50		-	66.612,25
109.800,00	8,96			0,58						75.108,94	-	-	122.643,52	21.362,46	62.590,78	-	-	62.590,78	918.584,80	145,28	5,21			-	
					183,13			9,76	9,76													100,16	42.830,66		-	66.612,25
109.820,00	9,36			0,39						75.292,07	-	-	122.643,58	21.372,16	62.743,39	-	-	62.743,39	918.727,65	152,61	4,81			-	
					190,51			6,62	6,62													94,15	42.924,81		-	66.612,25
109.840,00	9,70			0,27						75.482,58	-	-	122.643,60	21.378,76	62.902,15	-	-	62.902,15	918.879,79	158,76	4,61			-	
					194,21			3,96	3,96													92,15	43.016,96		-	66.612,25
109.860,00	9,73			0,13						75.676,79	-	-	122.643,56	21.382,76	63.063,99	-	-	63.063,99	919.037,67	161,84	4,61			-	
					206,58			3,99	3,99													96,15	43.113,11		-	66.612,25
109.880,00	10,93			0,27						75.883,37	-	-	122.643,55	21.386,76	63.236,14	-	-	63.236,14	919.205,83	172,15	5,01			-	
					178,34			17,30	17,30													100,16	43.213,27		-	66.612,25
109.900,00	6,90			1,46						76.061,71	-	-	122.643,55	21.404,06	63.384,76	-	-	63.384,76	919.337,15	148,62	5,01			-	
					132,12			24,89	24,89													98,16	43.311,43		-	66.612,25
109.920,00	6,31			1,03						76.193,83	-	-	122.643,54	21.428,96	63.494,86	-	-	63.494,86	919.422,36	110,10	4,81			-	
					118,33			24,37	24,37													96,15	43.407,58		-	66.612,25
109.940,00	5,52			1,41						76.312,16	-	-	122.643,51	21.453,36	63.593,47	-	-	63.593,47	919.496,60	98,61	4,81			-	
					104,07			22,39	22,39													90,14	43.497,72		-	66.612,25
109.960,00	4,88			0,83						76.416,23	-	-	122.643,50	21.475,76	63.680,19	-	-	63.680,19	919.560,93	86,72	4,21			-	
					106,20			17,52	17,52													86,14	43.583,86		-	66.612,25
109.980,00	5,74			0,92						76.522,43	-	-	122.643,52	21.493,26	63.768,69	-	-	63.768,69	919.631,91	88,50	4,41			-	

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9									
					106,50			30,35	30,35														88,14	43.672,00		-	66.612,25
110.000,00	4,91			2,12						76.628,93	-	-	122.643,47	21.523,66		63.857,44	-	-	63.857,44	919.690,31	88,75	4,41					
					106,72			105,58	88,93														98,49	43.770,49		-	66.612,25
110.020,00	5,76			8,44						76.735,65	-	-	122.643,45	21.629,26		63.946,38	-	-	63.946,38	919.673,67	88,94	5,44					
					87,97			171,44	73,31														85,73	43.856,22		-	66.612,25
110.034,23	6,61			15,66						76.823,62	-	-	122.731,41	21.712,74		64.019,68	-	-	64.019,68	919.575,53	73,30	6,61					
					28,48			73,71	23,73														28,48	43.884,70		-	66.612,25
110.038,53	6,61			18,56						76.852,10	-	-	122.779,85	21.738,01		64.043,42	-	-	64.043,42	919.525,56	23,74	6,61					
					9,69			28,12	8,08														9,69	43.894,39		-	66.612,25
110.040,00	6,61			19,79						76.861,79	-	-	122.799,36	21.746,62		64.051,49	-	-	64.051,49	919.505,51	8,07	6,61					
					19,07			60,28	15,89														19,07	43.913,46		-	66.612,25
110.042,84	6,81			22,64						76.880,86	-	-	122.842,97	21.763,29		64.067,38	-	-	64.067,38	919.461,12	15,89	6,81					
					125,48			462,95	104,57														125,47	44.038,93		-	66.612,25
110.060,00	7,81			31,32						77.006,34	-	-	123.205,23	21.863,98		64.171,95	-	-	64.171,95	919.102,74	104,57	7,81					
					156,74			626,59	130,62														156,26	44.195,19		-	66.612,25
110.080,00	7,86			31,34						77.163,08	-	-	123.714,46	21.981,34		64.302,57	-	-	64.302,57	918.606,77	130,62	7,81					
					155,80			592,64	129,83														154,25	44.349,44		-	66.612,25
110.100,00	7,72			27,92						77.318,88	-	-	124.189,74	22.098,70		64.432,40	-	-	64.432,40	918.143,96	129,83	7,61					
					151,45			543,82	126,21														150,25	44.499,69		-	66.612,25
110.120,00	7,42			26,46						77.470,33	-	-	124.616,20	22.216,06		64.558,61	-	-	64.558,61	917.726,35	126,21	7,41					
					145,07			494,81	120,89														144,24	44.643,93		-	66.612,25
110.140,00	7,08			23,02						77.615,40	-	-	124.993,65	22.333,42		64.679,50	-	-	64.679,50	917.352,43	120,89	7,01					
					58,30			186,70	48,58														57,14	44.701,07		-	66.612,25
110.148,27	7,02			22,14						77.673,70	-	-	125.131,83	22.381,94		64.728,08	-	-	64.728,08	917.214,31	48,58	6,81					
					80,74			247,03	67,28														78,22	44.779,29		-	66.612,25
110.160,00	6,63			19,25						77.754,44	-	-	125.310,02	22.450,78		64.795,37	-	-	64.795,37	917.034,57	67,29	6,40					
					28,82			80,83	24,02														27,74	44.807,03		-	66.612,25
110.164,33	6,68			18,06						77.783,26	-	-	125.365,42	22.476,21		64.819,38	-	-	64.819,38	916.977,75	24,01	6,40					
					105,96			198,64	88,30														99,58	44.906,61		-	66.612,25
110.180,00	6,74			6,89						77.889,22	-	-	125.472,13	22.568,14		64.907,68	-	-	64.907,68	916.867,41	88,30	6,20					
					2,68			2,68	2,23														2,46	44.909,07		-	66.612,25
110.180,40	6,75			6,62						77.891,90	-	-	125.472,48	22.570,47		64.909,92	-	-	64.909,92	916.866,97	2,24	6,20					
					30,29			25,00	25,00														27,59	44.936,66		-	66.612,25
110.184,92	6,64			4,44						77.922,19	-	-	125.472,47	22.595,48		64.935,16	-	-	64.935,16	916.867,21	25,24	6,00					
					95,46			38,19	38,19														80,44	45.017,10		-	66.612,25
110.200,00	5,74			0,48						78.017,65	-	-	125.473,56	22.632,58		65.014,71	-	-	65.014,71	916.908,57	79,55	4,43					
					115,49			27,67	27,67														90,58	45.107,68		-	66.612,25
110.220,00	5,68			2,26						78.133,14	-	-	125.473,83	22.659,98		65.110,95	-	-	65.110,95	916.977,14	96,24	4,54					
					-			-	-														-	45.107,68		-	66.612,25
110.220,00	5,68			2,26						78.133,14	-	-	125.473,83	22.659,98		65.110,95	-	-	65.110,95	916.977,14	-	4,54					
					119,56			98,19	98,19														96,05	45.203,73		-	66.612,25
110.240,00	6,16			7,24						78.252,70	-	-	125.477,02	22.754,98		65.210,58	-	-	65.210,58	916.978,58	99,63	4,96					
					94,59			137,86	78,83														77,71	45.281,44		-	66.612,25
110.255,08	6,22			10,36						78.347,29	-	-	125.526,38	22.843,48		65.289,41	-	-	65.289,41	916.919,55	78,83	5,19					
					31,00			52,49	25,83														26,01	45.307,45		-	66.612,25
110.260,00	6,38			10,99						78.378,29	-	-	125.550,01	22.872,34		65.315,24	-	-	65.315,24	916.892,89	25,83	5,38					
					55,19			90,17	45,99														45,21	45.352,66		-	66.612,25
110.268,44	6,71			10,39						78.433,48	-	-	125.590,68	22.921,84		65.361,23	-	-	65.361,23	916.848,71	45,99	5,34					
					84,14			111,12	70,12														63,75	45.416,41		-	66.612,25
110.280,00	7,69			8,22						78.517,62	-	-	125.633,94	22.989,70		65.431,35	-	-	65.431,35	916.807,71	70,12	5,54					
					153,11			166,31	127,59														112,78	45.529,19		-	66.612,25
110.300,00	7,44			7,92						78.670,73	-	-	125.682,89	23.107,06		65.558,94	-	-	65.558,94	916.768,99	127,59	5,58					
					149,93			176,43	124,94														112,57	45.641,76		-	66.612,25
110.320,00	7,37			9,22						78.820,66	-	-	125.741,96	23.224,42		65.683,88	-	-	65.683,88	916.717,50	124,94	5,52					
					149,00			188,92	124,17														111,97	45.753,73		-	66.612,25
110.340,00	7,35			9,12						78.969,66	-	-	125.813,52	23.341,78		65.808,05	-	-	65.808,05	916.652,75	124,17	5,52					
					39,26			48,97	32,72														29,27	45.783,00		-	66.612,25
110.345,24	7,44			9,02						79.008,92	-	-	125.831,72	23.372,55		65.840,77	-	-	65.840,77	916.636,50	32,72	5,49					
					110,43			145,93	92,03														81,67	45.864,67		-	66.612,25
110.360,00	7,35			10,18						79.119,35	-	-	125.891,06	23.459,14		65.932,79	-	-	65.932,79	916.582,59	92,02	5,43					
					143,97			171,77	119,98														106,50	45.971,17		-	66.612,25
110.380,00	6,90			6,60						79.263,32	-	-	125.945,47	23.576,50		66.052,77	-	-	66.052,77	916.530,80	119,98	5,09					
					135,76			111,28	111,28														98,62	46.069,79		-	66.612,25
110.400,00	6,55			4,36						79.399,08	-	-	125.947,15	23.686,10		66.165,90	-	-	66.165,90	916.532,65	113,13	4,67					
					134,33			86,72	86,72														94,72	46.164,51		-	66.612,25
110.420,00	6,74			4,14						79.533,41	-	-	125.948,87	23.771,10		66.277,84	-	-	66.277,84	916.557,87	111,94	4,69					
					14,10			8,35	8,35														9,63	46.174,14		-	66.612,25
110.422,05	7,00			3,99						79.547,51	-	-	125.948,87	23.779,45		66.289,59	-	-	66.289,59	916.561,27	11,75	4,69					
					121,93			61,20	61,20														82,22	46.256,36		-	66.612,25
110.440,00	6,59			2,83						79.669,44	-	-	125.948,88	23.840,64		66.391,20	-	-	66.391,20	916.601,68	101,61	4,47					
					132,79			48,89	48,89														89,78	46.346,14		-	66.612,25
110.460,00	6,69			2,06						79.802,23	-	-	125.948,87	23.889,54		66.501,86	-	-	66.501,86	916.663,45	110,66	4,51					
					130,37			51,43	51,43														90,47	46.436,61		-	66.612,25
110.480,00	6,34			3,09						79.932,60	-	-	125.948,80	23.941,04		66.610,50	-	-	66.610,50	916.720,66	108,64	4,54					
					122,60			52,32	52,32														89,98	46.526,59		-	66.612,25
110.500,00	5,92			2,15						80.055,20	-	-	125.948,72	23.993,44		66.712,67	-	-	66.712,67	916.770,51	102,17	4,46					
					113,74			39,35	39,35														88,81	46.615,40		-	66.612,25
110.520,00	5,46			1,79						80.168,94	-	-	125.948,67	24.032,84		66.807,45	-	-	66.807,45	916.825,94	94,78	4,42					
					109,03			20,65	20,65														86,45	46.701,85		-	66.612,25
110.540,00	5,45			0,28						80.277,97	-	-	125.948,62	24.053,54		66.898,31	-	-	66.898,31	916.896,15	90,86	4,22					
					98,57			8,73	8,73														75,65	46.777,50		-	66.612,25
110.560,00	4,41			0,60						80.376,54	-	-	125.948,55	24.062,34		66.980,45	-	-	66.980,45	916.969,56	82,14	3,34					

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					88,77			14,34	14,34														67,39	46.844,89		-	66.612,25
110.580,00	4,47			0,84						80.465,31	-	-	125.948,49	24.076,74		67.054,42	-	-	67.054,42	917.029,19	73,97	3,40			-		
					86,57			16,09	16,09														67,97	46.912,86		-	66.612,25
110.600,00	4,19			0,77						80.551,88	-	-	125.948,48	24.092,84		67.126,57	-	-	67.126,57	917.085,25	72,15	3,40			-		
					85,74			19,85	19,85														66,84	46.979,70		-	66.612,25
110.620,00	4,38			1,21						80.637,62	-	-	125.948,53	24.112,64		67.198,02	-	-	67.198,02	917.136,85	71,45	3,29			-		
					93,34			19,03	19,03														66,84	47.046,54		-	66.612,25
110.640,00	4,95			0,69						80.730,96	-	-	125.948,56	24.131,64		67.275,80	-	-	67.275,80	917.195,60	77,78	3,40			-		
					101,63			10,46	10,46														67,97	47.114,51		-	66.612,25
110.660,00	5,21			0,36						80.832,59	-	-	125.948,52	24.142,14		67.360,49	-	-	67.360,49	917.269,83	84,69	3,40			-		
					112,10			3,57	3,57														67,07	47.181,58		-	66.612,25
110.680,00	6,00			-						80.944,69	-	-	125.948,49	24.145,74		67.453,91	-	-	67.453,91	917.359,68	93,42	3,31			-		
					124,98			-	-														65,95	47.247,53		-	66.612,25
110.700,00	6,50			-						81.069,67	-	-	125.948,49	24.145,74		67.558,06	-	-	67.558,06	917.463,83	104,15	3,29			-		
					133,24			-	-														66,84	47.314,37		-	66.612,25
110.720,00	6,82			-						81.202,91	-	-	125.948,49	24.145,74		67.669,09	-	-	67.669,09	917.574,86	111,03	3,40			-		
					124,22			0,04	0,04														67,97	47.382,34		-	66.612,25
110.740,00	5,60			-						81.327,13	-	-	125.948,53	24.145,74		67.772,61	-	-	67.772,61	917.678,34	103,52	3,40			-		
					108,30			1,58	1,58														67,55	47.449,89		-	66.612,25
110.760,00	5,23			0,15						81.435,43	-	-	125.948,61	24.147,24		67.862,86	-	-	67.862,86	917.767,01	90,25	3,36			-		
					107,77			1,95	1,95														65,43	47.515,32		-	66.612,25
110.780,00	5,55			0,04						81.543,20	-	-	125.948,66	24.149,14		67.952,67	-	-	67.952,67	917.854,87	89,81	3,19			-		
					122,75			0,52	0,52														65,84	47.581,16		-	66.612,25
110.800,00	6,73			0,01						81.665,95	-	-	125.948,68	24.149,64		68.054,96	-	-	68.054,96	917.956,64	102,29	3,40			-		
					25,49			0,04	0,04														12,66	47.593,82		-	66.612,25
110.803,79	6,73			0,01						81.691,44	-	-	125.948,68	24.149,68		68.076,20	-	-	68.076,20	917.977,84	21,24	3,29			-		
					76,00			0,23	0,23														34,13	47.627,95		-	66.612,25
110.814,06	8,06			0,04						81.767,44	-	-	125.948,65	24.149,94		68.139,53	-	-	68.139,53	918.040,94	63,33	3,36			-		
					49,69			0,19	0,19														19,75	47.647,70		-	66.612,25
110.820,00	8,68			0,03						81.817,13	-	-	125.948,63	24.150,15		68.180,94	-	-	68.180,94	918.082,16	41,41	3,30			-		
					38,49			0,12	0,12														14,43	47.662,13		-	66.612,25
110.824,34	9,06			0,02						81.855,62	-	-	125.948,64	24.150,26		68.213,02	-	-	68.213,02	918.114,12	32,08	3,35			-		
					146,01			0,36	0,36														52,73	47.714,86		-	66.612,25
110.840,00	9,58			0,02						82.001,63	-	-	125.948,69	24.150,57		68.334,69	-	-	68.334,69	918.235,43	121,67	3,38			-		
					206,62			0,21	0,21														67,65	47.782,51		-	66.612,25
110.860,00	11,08			-						82.208,25	-	-	125.948,70	24.150,77		68.506,88	-	-	68.506,88	918.407,41	172,19	3,39			-		
					184,81			-	-														53,18	47.835,69		-	66.612,25
110.875,71	12,46			-						82.393,06	-	-	125.948,70	24.150,77		68.660,88	-	-	68.660,88	918.561,41	154,00	3,39			-		
					55,16			-	-														14,89	47.850,58		-	66.612,25
110.880,00	12,91			-						82.448,22	-	-	125.948,70	24.150,77		68.706,85	-	-	68.706,85	918.607,38	45,97	3,46			-		
					35,76			-	-														9,41	47.859,99		-	66.612,25
110.882,71	13,12			-						82.483,98	-	-	125.948,70	24.150,77		68.736,65	-	-	68.736,65	918.637,18	29,80	3,39			-		
					97,12			-	-														24,52	47.884,51		-	66.612,25
110.889,72	14,20			-						82.581,10	-	-	125.948,70	24.150,77		68.817,58	-	-	68.817,58	918.718,11	80,93	3,50			-		
					157,89			0,03	0,03														37,19	47.921,70		-	66.612,25
110.900,00	16,52			0,01						82.738,99	-	-	125.948,68	24.150,82		68.949,16	-	-	68.949,16	918.849,66	131,58	3,74			-		
					270,32			0,05	0,05														56,92	47.978,62		-	66.612,25
110.914,82	19,97			-						83.009,31	-	-	125.948,66	24.150,89		69.174,42	-	-	69.174,42	919.074,87	225,26	3,95			-		
					103,02			-	-														20,68	47.999,30		-	66.612,25
110.920,00	20,79			-						83.112,33	-	-	125.948,66	24.150,89		69.260,28	-	-	69.260,28	919.160,73	85,86	4,24			-		
					55,15			-	-														11,17	48.010,47		-	66.612,25
110.922,56	22,35			-						83.167,48	-	-	125.948,66	24.150,89		69.306,23	-	-	69.306,23	919.206,68	45,95	4,49			-		
					169,54			-	-														34,01	48.044,48		-	66.612,25
110.930,30	22,64			-						83.337,02	-	-	125.948,66	24.150,89		69.447,52	-	-	69.447,52	919.347,97	141,29	4,54			-		
					218,58			-	-														43,84	48.088,32		-	66.612,25
110.940,00	22,42			-						83.555,60	-	-	125.948,66	24.150,89		69.629,67	-	-	69.629,67	919.530,12	182,15	4,50			-		
					436,05			-	-														90,39	48.178,71		-	66.612,25
110.960,00	21,19			-						83.991,65	-	-	125.948,66	24.150,89		69.993,04	-	-	69.993,04	919.893,49	363,37	4,54			-		
					397,99			-	-														89,21	48.267,92		-	66.612,25
110.980,00	18,61			-						84.389,64	-	-	125.948,66	24.150,89		70.324,70	-	-	70.324,70	920.225,15	331,66	4,38			-		
					354,92			-	-														87,93	48.355,85		-	66.612,25
111.000,00	16,88			-						84.744,56	-	-	125.948,66	24.150,89		70.620,47	-	-	70.620,47	920.520,92	295,77	4,41			-		
					320,64			-	-														88,00	48.443,85		-	66.612,25
111.020,00	15,18			-						85.065,20	-	-	125.948,66	24.150,89		70.887,67	-	-	70.887,67	920.788,12	267,20	4,39			-		
					300,43			-	-														87,71	48.531,56		-	66.612,25
111.040,00	14,86			-						85.365,63	-	-	125.948,66	24.150,89		71.138,03	-	-	71.138,03	921.038,48	250,36	4,38			-		
					271,57			-	-														87,04	48.618,60		-	66.612,25
111.060,00	12,30			-						85.637,20	-	-	125.948,66	24.150,89		71.364,33	-	-	71.364,33	921.264,78	226,30	4,32			-		
					29,75			-	-														10,58	48.629,18		-	66.612,25
111.062,48	11,75			-						85.666,95	-	-	125.948,66	24.150,89		71.389,12	-	-	71.389,12	921.289,57	24,79	4,23			-		
					76,18			-	-														28,68	48.657,86		-	66.612,25
111.069,42	10,78			-						85.743,13	-	-	125.948,66	24.150,89		71.452,61	-	-	71.452,61	921.353,06	63,49	4,26			-		
					69,62			-	-														28,39	48.686,25		-	66.612,25
111.076,36	9,78			-						85.812,75	-	-	125.948,66	24.150,89		71.510,62	-	-	71.510,62	921.411,07	58,01	4,12			-		
					34,58			-	-														14,87	48.701,12		-	66.612,25
111.080,00	9,22			-						85.847,33	-	-	125.948,66	24.150,89		71.539,44	-	-	71.539,44	921.439,89	28,82	4,05			-		
					169,17			-	-														77,85	48.778,97		-	66.612,25
111.100,00	7,70			-						86.016,50	-	-	125.948,66	24.150,89		71.680,42	-	-	71.680,42	921.580,87	140,98	3,74			-		
					10,95			-	-														5,26	48.784,23		-	66.612,25
111.101,45	7,44			-						86.027,45	-	-	125.948,66	24.150,89		71.689,54	-	-	71.689,54	921.589,99	9,12	3,53			-		
					53,03			-	-														25,49	48.809,72		-	66.612,25
111.108,56	7,25			-						86.080,48	-	-	125.948,66	24.150,89		71.733,73	-	-	71.733,73	921.634,18	44,19	3,53			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)							
					51,52			-	-													24,96	48.834,68		-	66.612,25
111.115,68	7,04			-						86.132,00	-	-	125.948,66	24.150,89	71.776,67	-	-	71.776,67	921.677,12	42,94	3,39			-		
					30,91			-	-													15,08	48.849,76		-	66.612,25
111.120,00	7,25			-						86.162,91	-	-	125.948,66	24.150,89	71.802,42	-	-	71.802,42	921.702,87	25,75	3,58			-		
					143,90			-	-													69,74	48.919,50		-	66.612,25
111.140,00	7,14			-						86.306,81	-	-	125.948,66	24.150,89	71.922,34	-	-	71.922,34	921.822,79	119,92	3,39			-		
					148,16			-	-													68,96	48.988,46		-	66.612,25
111.160,00	7,68			-						86.454,97	-	-	125.948,66	24.150,89	72.045,81	-	-	72.045,81	921.946,26	123,47	3,50			-		
					150,48			-	-													70,43	49.058,89		-	66.612,25
111.180,00	7,37			-						86.605,45	-	-	125.948,66	24.150,89	72.171,21	-	-	72.171,21	922.071,66	125,40	3,54			-		
					142,31			-	-													70,13	49.129,02		-	66.612,25
111.200,00	6,86			-						86.747,76	-	-	125.948,66	24.150,89	72.289,80	-	-	72.289,80	922.190,25	118,59	3,47			-		
					134,15			-	-													68,83	49.197,85		-	66.612,25
111.220,00	6,55			-						86.881,91	-	-	125.948,66	24.150,89	72.401,59	-	-	72.401,59	922.302,04	111,79	3,41			-		
					129,69			-	-													70,13	49.267,98		-	66.612,25
111.240,00	6,42			-						87.011,60	-	-	125.948,66	24.150,89	72.509,67	-	-	72.509,67	922.410,12	108,08	3,60			-		
					133,80			-	-													70,04	49.338,02		-	66.612,25
111.260,00	6,96			-						87.145,40	-	-	125.948,66	24.150,89	72.621,17	-	-	72.621,17	922.521,62	111,50	3,40			-		
					154,07			-	-													68,83	49.406,85		-	66.612,25
111.280,00	8,44			-						87.299,47	-	-	125.948,66	24.150,89	72.749,56	-	-	72.749,56	922.650,01	128,39	3,48			-		
					106,96			-	-													47,92	49.454,77		-	66.612,25
111.293,67	7,21			-						87.406,43	-	-	125.948,66	24.150,89	72.838,69	-	-	72.838,69	922.739,14	89,13	3,53			-		
					45,79			-	-													22,64	49.477,41		-	66.612,25
111.300,00	7,15			-						87.452,22	-	-	125.948,66	24.150,89	72.876,85	-	-	72.876,85	922.777,30	38,16	3,55			-		
					148,72			-	-													70,95	49.548,36		-	66.612,25
111.320,00	7,61			-						87.600,94	-	-	125.948,66	24.150,89	73.000,78	-	-	73.000,78	922.901,23	123,93	3,48			-		
					160,37			-	-													69,57	49.617,93		-	66.612,25
111.340,00	8,30			-						87.761,31	-	-	125.948,66	24.150,89	73.134,42	-	-	73.134,42	923.034,87	133,64	3,42			-		
					167,54			-	-													70,85	49.688,78		-	66.612,25
111.360,00	8,31			-						87.928,85	-	-	125.948,66	24.150,89	73.274,04	-	-	73.274,04	923.174,49	139,62	3,60			-		
					167,83			-	-													72,83	49.761,61		-	66.612,25
111.380,00	8,32			-						88.096,68	-	-	125.948,66	24.150,89	73.413,90	-	-	73.413,90	923.314,35	139,86	3,61			-		
					134,95			-	-													59,65	49.821,26		-	66.612,25
111.396,74	7,67			-						88.231,63	-	-	125.948,66	24.150,89	73.526,36	-	-	73.526,36	923.426,81	112,46	3,45			-		
					25,10			-	-													11,28	49.832,54		-	66.612,25
111.400,00	7,72			-						88.256,73	-	-	125.948,66	24.150,89	73.547,27	-	-	73.547,27	923.447,72	20,91	3,46			-		
					158,55			-	-													70,85	49.903,39		-	66.612,25
111.420,00	8,01			-						88.415,28	-	-	125.948,66	24.150,89	73.679,40	-	-	73.679,40	923.579,85	132,13	3,55			-		
					164,13			-	-													68,57	49.971,96		-	66.612,25
111.440,00	8,29			-						88.579,41	-	-	125.948,66	24.150,89	73.816,18	-	-	73.816,18	923.716,63	136,78	3,25			-		
					169,59			-	-													66,89	50.038,85		-	66.612,25
111.460,00	8,56			-						88.749,00	-	-	125.948,66	24.150,89	73.957,50	-	-	73.957,50	923.857,95	141,32	3,39			-		
					176,72			-	-													66,75	50.105,60		-	66.612,25
111.480,00	8,98			-						88.925,72	-	-	125.948,66	24.150,89	74.104,77	-	-	74.104,77	924.005,22	147,27	3,23			-		
					177,42			-	-													66,76	50.172,36		-	66.612,25
111.499,81	8,79			-						89.103,14	-	-	125.948,66	24.150,89	74.252,62	-	-	74.252,62	924.153,07	147,85	3,45			-		
					1,67			-	-													0,65	50.173,01		-	66.612,25
111.500,00	8,68			-						89.104,81	-	-	125.948,66	24.150,89	74.254,01	-	-	74.254,01	924.154,46	1,39	3,37			-		
					56,24			-	-													22,72	50.195,73		-	66.612,25
111.506,98	7,44			-						89.161,05	-	-	125.948,66	24.150,89	74.300,88	-	-	74.300,88	924.201,33	46,87	3,14			-		
					100,17			-	-													42,22	50.237,95		-	66.612,25
111.520,00	7,83			-						89.261,22	-	-	125.948,66	24.150,89	74.384,35	-	-	74.384,35	924.284,80	83,47	3,27			-		
					174,79			-	-													67,34	50.305,29		-	66.612,25
111.540,00	9,50			-						89.436,01	-	-	125.948,66	24.150,89	74.530,01	-	-	74.530,01	924.430,46	145,66	3,39			-		
					4,27			-	-													1,52	50.306,81		-	66.612,25
111.540,45	9,47			-						89.440,28	-	-	125.948,66	24.150,89	74.533,57	-	-	74.533,57	924.434,02	3,56	3,36			-		
					216,63			-	-													68,78	50.375,59		-	66.612,25
111.560,00	12,43			-						89.656,91	-	-	125.948,66	24.150,89	74.714,09	-	-	74.714,09	924.614,54	180,52	3,59			-		
					169,55			-	-													50,15	50.425,74		-	66.612,25
111.573,92	11,61			-						89.826,46	-	-	125.948,66	24.150,89	74.855,38	-	-	74.855,38	924.755,83	141,29	3,53			-		
					68,27			-	-													21,44	50.447,18		-	66.612,25
111.580,00	10,86			-						89.894,73	-	-	125.948,66	24.150,89	74.912,27	-	-	74.912,27	924.812,72	56,89	3,53			-		
					202,98			-	-													68,35	50.515,53		-	66.612,25
111.600,00	9,44			-						90.097,71	-	-	125.948,66	24.150,89	75.081,42	-	-	75.081,42	924.981,87	169,15	3,31			-		
					185,88			-	-													68,10	50.583,63		-	66.612,25
111.620,00	9,15			-						90.283,59	-	-	125.948,66	24.150,89	75.236,32	-	-	75.236,32	925.136,77	154,90	3,50			-		
					184,25			-	-													70,31	50.653,94		-	66.612,25
111.640,00	9,28			-						90.467,84	-	-	125.948,66	24.150,89	75.389,87	-	-	75.389,87	925.290,32	153,55	3,53			-		
					146,66			-	-													55,80	50.709,74		-	66.612,25
111.656,08	8,96			-						90.614,50	-	-	125.948,66	24.150,89	75.512,08	-	-	75.512,08	925.412,53	122,21	3,41			-		
					34,71			-	-													13,14	50.722,88		-	66.612,25
111.660,00	8,73			-						90.649,21	-	-	125.948,66	24.150,89	75.541,01	-	-	75.541,01	925.441,46	28,93	3,28			-		
					44,93			-	-													17,39	50.740,27		-	66.612,25
111.664,98	9,13			-						90.694,14	-	-	125.948,66	24.150,89	75.578,45	-	-	75.578,45	925.478,90	37,44	3,64			-		
					86,72			-	-													31,72	50.771,99		-	66.612,25
111.673,89	10,16			-						90.780,86	-	-	125.948,66	24.150,89	75.650,72	-	-	75.650,72	925.551,17	72,27	3,42			-		
					61,15			-	-													21,57	50.793,56		-	66.612,25
111.680,00	9,85			-						90.842,01	-	-	125.948,66	24.150,89	75.701,68	-	-	75.701,68	925.602,13	50,96	3,64			-		
					203,58			-	-													77,02	50.870,58		-	66.612,25
111.700,00	10,50			-						91.045,59	-	-	125.948,66	24.150,89	75.871,32	-	-	75.871,32	925.771,77	169,64	4,06			-		
					11,52			-	-													4,54	50.875,12		-	66.612,25
111.701,09	10,69			-						91.057,11	-	-	125.948,66	24.150,89	75.880,92	-	-	75.880,92	925.781,37	9,60	4,28			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					75,02			3,10	3,10														30,73	50.905,85		-	66.612,25
111.708,17	10,81			0,91						91.132,13	-	-	125.948,53	24.154,12	75.943,44	-	-	75.943,44	925.840,79	62,52	4,54			-		
					75,54			7,72	7,72														31,77	50.937,62		-	66.612,25
111.715,26	10,86			1,36						91.207,67	-	-	125.948,21	24.162,16	76.006,39	-	-	76.006,39	925.896,02	62,95	4,60			-		
					51,61			6,56	6,56														21,82	50.959,44		-	66.612,25
111.720,00	10,90			1,40						91.259,28	-	-	125.948,22	24.168,71	76.049,40	-	-	76.049,40	925.932,47	43,01	4,60			-		
					208,22			28,18	28,18														93,26	51.052,70		-	66.612,25
111.740,00	9,92			1,42						91.467,50	-	-	125.948,20	24.196,91	76.222,92	-	-	76.222,92	926.077,81	173,52	4,73			-		
					185,98			82,54	82,54														97,64	51.150,34		-	66.612,25
111.760,00	8,68			6,84						91.653,48	-	-	125.948,14	24.279,51	76.377,90	-	-	76.377,90	926.150,25	154,98	5,04			-		
					164,39			78,82	78,82														94,92	51.245,26		-	66.612,25
111.780,00	7,76			1,04						91.817,87	-	-	125.948,16	24.358,31	76.514,89	-	-	76.514,89	926.208,42	136,99	4,45			-		
					167,93			26,53	26,53														92,73	51.337,99		-	66.612,25
111.800,00	9,03			1,61						91.985,80	-	-	125.948,19	24.384,81	76.654,83	-	-	76.654,83	926.321,83	139,94	4,82			-		
					187,80			21,90	21,90														91,98	51.429,97		-	66.612,25
111.820,00	9,75			0,58						92.173,60	-	-	125.948,19	24.406,71	76.811,33	-	-	76.811,33	926.456,43	156,50	4,38			-		
					76,92			2,33	2,33														34,23	51.464,20		-	66.612,25
111.828,02	9,44			-						92.250,52	-	-	125.948,20	24.409,03	76.875,43	-	-	76.875,43	926.518,20	64,10	4,16			-		
					56,41			-	-														24,24	51.488,44		-	66.612,25
111.834,06	9,49			-						92.306,93	-	-	125.948,20	24.409,03	76.922,44	-	-	76.922,44	926.565,21	47,01	3,99			-		
					55,13			-	-														23,35	51.511,79		-	66.612,25
111.840,00	9,32			-						92.362,06	-	-	125.948,20	24.409,03	76.968,38	-	-	76.968,38	926.611,15	45,94	3,99			-		
					0,94			-	-														0,40	51.512,19		-	66.612,25
111.840,10	9,32			-						92.363,00	-	-	125.948,20	24.409,03	76.969,17	-	-	76.969,17	926.611,94	0,79	3,99			-		
					178,65			-	-														77,51	51.589,70		-	66.612,25
111.860,00	8,64			-						92.541,65	-	-	125.948,20	24.409,03	77.118,04	-	-	77.118,04	926.760,81	148,87	3,80			-		
					48,18			-	-														21,36	51.611,06		-	66.612,25
111.865,78	8,02			-						92.589,83	-	-	125.948,20	24.409,03	77.158,19	-	-	77.158,19	926.800,96	40,15	3,59			-		
					51,61			-	-														22,76	51.633,82		-	66.612,25
111.872,32	7,63			-						92.641,44	-	-	125.948,20	24.409,03	77.201,20	-	-	77.201,20	926.843,97	43,01	3,32			-		
					52,12			-	-														22,44	51.656,26		-	66.612,25
111.878,85	8,19			-						92.693,56	-	-	125.948,20	24.409,03	77.244,63	-	-	77.244,63	926.887,40	43,43	3,50			-		
					9,30			-	-														3,90	51.660,16		-	66.612,25
111.880,00	7,95			-						92.702,86	-	-	125.948,20	24.409,03	77.252,38	-	-	77.252,38	926.895,15	7,75	3,28			-		
					167,78			-	-														66,81	51.726,97		-	66.612,25
111.900,00	8,83			-						92.870,64	-	-	125.948,20	24.409,03	77.392,20	-	-	77.392,20	927.034,97	139,82	3,40			-		
					188,58			-	-														69,00	51.795,97		-	66.612,25
111.920,00	10,02			-						93.059,22	-	-	125.948,20	24.409,03	77.549,35	-	-	77.549,35	927.192,12	157,15	3,50			-		
					205,93			-	-														69,96	51.865,93		-	66.612,25
111.940,00	10,57			-						93.265,15	-	-	125.948,20	24.409,03	77.720,96	-	-	77.720,96	927.363,73	171,61	3,50			-		
					216,58			-	-														69,96	51.935,89		-	66.612,25
111.960,00	11,09			-						93.481,73	-	-	125.948,20	24.409,03	77.901,44	-	-	77.901,44	927.544,21	180,48	3,50			-		
					221,49			-	-														69,96	52.005,85		-	66.612,25
111.980,00	11,06			-						93.703,22	-	-	125.948,20	24.409,03	78.086,02	-	-	78.086,02	927.728,79	184,58	3,50			-		
					219,90			-	-														69,96	52.075,81		-	66.612,25
112.000,00	10,93			-						93.923,12	-	-	125.948,20	24.409,03	78.269,27	-	-	78.269,27	927.912,04	183,25	3,50			-		
					209,63			-	-														69,96	52.145,77		-	66.612,25
112.020,00	10,03			-						94.132,75	-	-	125.948,20	24.409,03	78.443,96	-	-	78.443,96	928.086,73	174,69	3,50			-		
					188,37			-	-														69,96	52.215,73		-	66.612,25
112.040,00	8,80			-						94.321,12	-	-	125.948,20	24.409,03	78.600,93	-	-	78.600,93	928.243,70	156,97	3,50			-		
					169,24			-	-														69,96	52.285,69		-	66.612,25
112.060,00	8,12			-						94.490,36	-	-	125.948,20	24.409,03	78.741,97	-	-	78.741,97	928.384,74	141,04	3,50			-		
					156,33			-	-														67,78	52.353,47		-	66.612,25
112.080,00	7,51			-						94.646,69	-	-	125.948,20	24.409,03	78.872,24	-	-	78.872,24	928.515,01	130,27	3,28			-		
					150,29			-	-														66,91	52.420,38		-	66.612,25
112.100,00	7,52			-						94.796,98	-	-	125.948,20	24.409,03	78.997,48	-	-	78.997,48	928.640,25	125,24	3,41			-		
					161,94			-	-														66,91	52.487,29		-	66.612,25
112.120,00	8,68			-						94.958,92	-	-	125.948,20	24.409,03	79.132,43	-	-	79.132,43	928.775,20	134,95	3,28			-		
					174,98			-	-														65,59	52.552,88		-	66.612,25
112.140,00	8,82			-						95.133,90	-	-	125.948,20	24.409,03	79.278,25	-	-	79.278,25	928.921,02	145,82	3,28			-		
					172,26			-	-														66,09	52.618,97		-	66.612,25
112.160,00	8,40			-						95.306,16	-	-	125.948,20	24.409,03	79.421,80	-	-	79.421,80	929.064,57	143,55	3,33			-		
					172,55			-	-														68,24	52.687,21		-	66.612,25
112.180,00	8,85			-						95.478,71	-	-	125.948,20	24.409,03	79.565,59	-	-	79.565,59	929.208,36	143,79	3,49			-		
					193,98			-	-														69,92	52.757,13		-	66.612,25
112.200,00	10,55			-						95.672,69	-	-	125.948,20	24.409,03	79.727,24	-	-	79.727,24	929.370,01	161,65	3,50			-		
					195,62			-	-														68,24	52.825,37		-	66.612,25
112.220,00	9,01			-						95.868,31	-	-	125.948,20	24.409,03	79.890,26	-	-	79.890,26	929.533,03	163,02	3,33			-		
					185,72			-	-														68,15	52.893,52		-	66.612,25
112.240,00	9,56			-						96.054,03	-	-	125.948,20	24.409,03	80.045,03	-	-	80.045,03	929.687,80	154,77	3,49			-		
					188,27			-	-														68,00	52.961,52		-	66.612,25
112.260,00	9,27			-						96.242,30	-	-	125.948,20	24.409,03	80.201,92	-	-	80.201,92	929.844,69	156,89	3,31			-		
					183,71			-	-														68,09	53.029,61		-	66.612,25
112.280,00	9,10			-						96.426,01	-	-	125.948,20	24.409,03	80.355,01	-	-	80.355,01	929.997,78	153,09	3,50			-		
					184,43			-	-														69,77	53.099,38		-	66.612,25
112.300,00	9,34			-						96.610,44	-	-	125.948,20	24.409,03	80.508,70	-	-	80.508,70	930.151,47	153,69	3,48			-		
					172,93			-	-														67,94	53.167,32		-	66.612,25
112.320,00	7,95			-						96.783,37	-	-	125.948,20	24.409,03	80.652,81	-	-	80.652,81	930.295,58	144,11	3,32			-		
					161,75			-	-														65,95	53.233,27		-	66.612,25
112.340,00	8,22			-						96.945,12	-	-	125.948,20	24.409,03	80.787,60	-	-	80.787,60	930.430,37	134,79	3,28			-		
					173,52			-	-														65,59	53.298,86		-	66.612,25
112.360,00	9,13			-						97.118,64	-	-	125.948,20	24.409,03	80.932,20	-	-	80.932,20	930.574,97	144,60	3,28			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					188,08			-	-														67,45	53.366,31		-	66.612,25
112.380,00	9,68			-						97.306,72	-	-	125.948,20	24.409,03		81.088,93	-	-	81.088,93	930.731,70	156,73	3,47			-		
					188,87			-	-														69,64	53.435,95		-	66.612,25
112.400,00	9,21			-						97.495,59	-	-	125.948,20	24.409,03		81.246,32	-	-	81.246,32	930.889,09	157,39	3,50			-		
					183,97			0,02	0,02														69,96	53.505,91		-	66.612,25
112.420,00	9,19			-						97.679,56	-	-	125.948,22	24.409,03		81.399,63	-	-	81.399,63	931.042,38	153,31	3,50			-		
					65,96			0,01	0,01														25,12	53.531,03		-	66.612,25
112.427,18	9,18			-						97.745,52	-	-	125.948,23	24.409,03		81.454,60	-	-	81.454,60	931.097,34	54,97	3,50			-		
					116,56			0,01	0,01														44,43	53.575,46		-	66.612,25
112.440,00	9,00			-						97.862,08	-	-	125.948,24	24.409,03		81.551,73	-	-	81.551,73	931.194,46	97,13	3,43			-		
					99,78			0,11	0,11														37,38	53.612,84		-	66.612,25
112.451,15	8,90			0,02						97.961,86	-	-	125.948,24	24.409,14		81.634,88	-	-	81.634,88	931.277,50	83,15	3,27			-		
					81,09			0,08	0,08														29,92	53.642,76		-	66.612,25
112.460,00	9,42			-						98.042,95	-	-	125.948,23	24.409,23		81.702,46	-	-	81.702,46	931.345,00	67,58	3,49			-		
					135,95			-	-														52,70	53.695,46		-	66.612,25
112.475,12	8,56			-						98.178,90	-	-	125.948,23	24.409,23		81.815,75	-	-	81.815,75	931.458,29	113,29	3,48			-		
					40,49			-	-														16,54	53.712,00		-	66.612,25
112.480,00	8,02			-						98.219,39	-	-	125.948,23	24.409,23		81.849,49	-	-	81.849,49	931.492,03	33,74	3,29			-		
					164,88			-	-														67,51	53.779,51		-	66.612,25
112.500,00	8,46			-						98.384,27	-	-	125.948,23	24.409,23		81.986,89	-	-	81.986,89	931.629,43	137,40	3,46			-		
					176,09			-	-														67,25	53.846,76		-	66.612,25
112.520,00	9,15			-						98.560,36	-	-	125.948,23	24.409,23		82.133,63	-	-	82.133,63	931.776,17	146,74	3,27			-		
					193,33			-	-														67,71	53.914,47		-	66.612,25
112.540,00	10,19			-						98.753,69	-	-	125.948,23	24.409,23		82.294,74	-	-	82.294,74	931.937,28	161,11	3,51			-		
					201,34			-	-														68,59	53.983,06		-	66.612,25
112.560,00	9,95			-						98.955,03	-	-	125.948,23	24.409,23		82.462,53	-	-	82.462,53	932.105,07	167,79	3,35			-		
					189,61			-	-														68,37	54.051,43		-	66.612,25
112.580,00	9,01			-						99.144,64	-	-	125.948,23	24.409,23		82.620,53	-	-	82.620,53	932.263,07	158,00	3,48			-		
					195,74			-	-														69,67	54.121,10		-	66.612,25
112.600,00	10,56			-						99.340,38	-	-	125.948,23	24.409,23		82.783,65	-	-	82.783,65	932.426,19	163,12	3,48			-		
					201,30			-	-														69,67	54.190,77		-	66.612,25
112.620,00	9,57			-						99.541,68	-	-	125.948,23	24.409,23		82.951,40	-	-	82.951,40	932.593,94	167,75	3,48			-		
					197,18			-	-														69,67	54.260,44		-	66.612,25
112.640,00	10,15			-						99.738,86	-	-	125.948,23	24.409,23		83.115,72	-	-	83.115,72	932.758,26	164,32	3,48			-		
					194,85			-	-														69,67	54.330,11		-	66.612,25
112.660,00	9,34			-						99.933,71	-	-	125.948,23	24.409,23		83.278,09	-	-	83.278,09	932.920,63	162,37	3,48			-		
					183,07			-	-														69,67	54.399,78		-	66.612,25
112.680,00	8,97			-						100.116,78	-	-	125.948,23	24.409,23		83.430,65	-	-	83.430,65	933.073,19	152,56	3,48			-		
					178,51			-	-														69,67	54.469,45		-	66.612,25
112.700,00	8,88			-						100.295,29	-	-	125.948,23	24.409,23		83.579,41	-	-	83.579,41	933.221,95	148,76	3,48			-		
					161,11			-	-														64,87	54.534,32		-	66.612,25
112.719,08	8,01			-						100.456,40	-	-	125.948,23	24.409,23		83.713,67	-	-	83.713,67	933.356,21	134,26	3,32			-		
					7,41			-	-														3,12	54.537,44		-	66.612,25
112.720,00	8,10			-						100.463,81	-	-	125.948,23	24.409,23		83.719,84	-	-	83.719,84	933.362,38	6,17	3,47			-		
					51,82			-	-														22,61	54.560,05		-	66.612,25
112.726,47	7,66			-						100.515,63	-	-	125.948,23	24.409,23		83.763,03	-	-	83.763,03	933.405,57	43,19	3,42			-		
					60,39			-	-														26,41	54.586,46		-	66.612,25
112.733,86	8,41			-						100.576,02	-	-	125.948,23	24.409,23		83.813,35	-	-	83.813,35	933.455,89	50,32	3,63			-		
					54,39			-	-														22,77	54.609,23		-	66.612,25
112.740,00	9,29			-						100.630,41	-	-	125.948,23	24.409,23		83.858,68	-	-	83.858,68	933.501,22	45,33	3,78			-		
					224,63			-	-														78,51	54.687,74		-	66.612,25
112.759,69	13,53			-						100.855,04	-	-	125.948,23	24.409,23		84.045,87	-	-	84.045,87	933.688,41	187,19	4,20			-		
					4,20			-	-														1,30	54.689,04		-	66.612,25
112.760,00	13,60			-						100.859,24	-	-	125.948,23	24.409,23		84.049,37	-	-	84.049,37	933.691,91	3,50	4,20			-		
					100,40			-	-														30,21	54.719,25		-	66.612,25
112.767,34	14,54			-						100.959,64	-	-	125.948,23	24.409,23		84.133,03	-	-	84.133,03	933.775,57	83,66	4,26			-		
					105,85			-	-														31,51	54.750,76		-	66.612,25
112.774,99	13,97			-						101.065,49	-	-	125.948,23	24.409,23		84.221,24	-	-	84.221,24	933.863,78	88,21	4,21			-		
					69,04			-	-														20,92	54.771,68		-	66.612,25
112.780,00	13,61			-						101.134,53	-	-	125.948,23	24.409,23		84.278,78	-	-	84.278,78	933.921,32	57,54	4,14			-		
					258,57			-	-														82,86	54.854,54		-	66.612,25
112.800,00	12,25			-						101.393,10	-	-	125.948,23	24.409,23		84.494,25	-	-	84.494,25	934.136,79	215,47	4,14			-		
					234,05			-	-														82,86	54.937,40		-	66.612,25
112.820,00	11,16			-						101.627,15	-	-	125.948,23	24.409,23		84.689,29	-	-	84.689,29	934.331,83	195,04	4,14			-		
					218,97			-	-														82,86	55.020,26		-	66.612,25
112.840,00	10,74			-						101.846,12	-	-	125.948,23	24.409,23		84.871,77	-	-	84.871,77	934.514,31	182,48	4,14			-		
					200,29			0,87	0,87														82,86	55.103,12		-	66.612,25
112.860,00	9,29			0,09						102.046,41	-	-	125.948,20	24.410,13		85.038,68	-	-	85.038,68	934.680,35	166,91	4,14			-		
					148,15			26,60	26,60														87,22	55.190,34		-	66.612,25
112.880,00	5,53			2,57						102.194,56	-	-	125.948,20	24.436,73		85.162,13	-	-	85.162,13	934.777,20	123,45	4,58			-		
					45,11			29,21	29,21														39,20	55.229,54		-	66.612,25
112.888,62	4,94			4,21						102.239,67	-	-	125.948,20	24.465,94		85.199,72	-	-	85.199,72	934.785,58	37,59	4,52			-		
					34,51			32,65	28,76														31,92	55.261,46		-	66.612,25
112.896,27	4,39			4,44						102.274,18	-	-	125.947,75	24.499,04		85.228,48	-	-	85.228,48	934.781,69	28,76	4,10			-		
					16,41			18,70	13,68														15,60	55.277,06		-	66.612,25
112.900,00	4,69			5,71						102.290,59	-	-	125.947,52	24.517,97		85.242,16	-	-	85.242,16	934.776,67	13,68	4,52			-		
					17,38			23,47	14,48														16,86	55.293,92		-	66.612,25
112.903,93	4,47			6,45						102.307,97	-	-	125.947,96	24.541,00		85.256,64	-	-	85.256,64	934.767,68	14,48	4,36			-		
					69,66			90,04	58,05														68,25	55.362,17		-	66.612,25
112.920,00	4,20			4,75						102.377,63	-	-	125.947,98	24.631,02		85.314,69	-	-	85.314,69	934.735,69	58,05	4,13			-		
					60,06			55,85	50,05														57,73	55.419,90		-	66.612,25
112.934,68	3,98			2,85						102.437,69	-	-	125.948,03	24.686,82		85.364,74	-	-	85.364,74	934.729,89	50,05	3,73			-		

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9	(Homog.)								
					21,84			13,74	13,74														20,56	55.440,46		-	66.612,25
112.940,00	4,04			2,25						102.459,53	-	-	125.948,21	24.700,38		85.382,94	-	-	85.382,94	934.734,35	18,20	3,83					
					10,20			5,70	5,70														9,69	55.450,15		-	66.612,25
112.942,54	3,97			2,23						102.469,73	-	-	125.948,22	24.706,07		85.391,44	-	-	85.391,44	934.737,15	8,50	3,79					
					31,22			17,18	17,18														30,07	55.480,22		-	66.612,25
112.950,41	3,81			2,07						102.500,95	-	-	125.948,50	24.722,97		85.417,46	-	-	85.417,46	934.745,99	26,02	3,70					
					37,96			19,24	19,24														35,52	55.515,74		-	66.612,25
112.960,00	4,10			1,94						102.538,91	-	-	125.948,50	24.742,21		85.449,09	-	-	85.449,09	934.758,38	31,63	3,70					
					82,67			28,12	28,12														71,87	55.587,61		-	66.612,25
112.980,00	4,17			0,88						102.621,58	-	-	125.948,42	24.770,41		85.517,98	-	-	85.517,98	934.799,15	68,89	3,48					
					91,43			10,64	10,64														68,89	55.656,50		-	66.612,25
113.000,00	4,98			0,19						102.713,01	-	-	125.948,36	24.781,11		85.594,18	-	-	85.594,18	934.864,71	76,20	3,40					
					107,47			1,89	1,89														66,71	55.723,21		-	66.612,25
113.020,00	5,77			-						102.820,48	-	-	125.948,35	24.783,01		85.683,73	-	-	85.683,73	934.952,37	89,55	3,27					
					124,52			-	-														67,23	55.790,44		-	66.612,25
113.040,00	6,68			-						102.945,00	-	-	125.948,35	24.783,01		85.787,50	-	-	85.787,50	935.056,14	103,77	3,46					
					140,88			-	-														69,41	55.859,85		-	66.612,25
113.060,00	7,41			-						103.085,88	-	-	125.948,35	24.783,01		85.904,90	-	-	85.904,90	935.173,54	117,40	3,48					
					158,71			-	-														69,69	55.929,54		-	66.612,25
113.080,00	8,46			-						103.244,59	-	-	125.948,35	24.783,01		86.037,16	-	-	86.037,16	935.305,80	132,26	3,48					
					171,08			-	-														69,69	55.999,23		-	66.612,25
113.100,00	8,64			-						103.415,67	-	-	125.948,35	24.783,01		86.179,72	-	-	86.179,72	935.448,36	142,56	3,48					
					173,74			-	-														69,69	56.068,92		-	66.612,25
113.120,00	8,73			-						103.589,41	-	-	125.948,35	24.783,01		86.324,51	-	-	86.324,51	935.593,15	144,79	3,48					
					189,36			-	-														69,69	56.138,61		-	66.612,25
113.140,00	10,20			-						103.778,77	-	-	125.948,35	24.783,01		86.482,31	-	-	86.482,31	935.750,95	157,80	3,48					
					202,14			-	-														69,69	56.208,30		-	66.612,25
113.160,00	10,01			-						103.980,91	-	-	125.948,35	24.783,01		86.650,76	-	-	86.650,76	935.919,40	168,45	3,48					
					198,89			-	-														69,69	56.277,99		-	66.612,25
113.180,00	9,88			-						104.179,80	-	-	125.948,35	24.783,01		86.816,50	-	-	86.816,50	936.085,14	165,74	3,48					
					194,62			-	-														69,36	56.347,35		-	66.612,25
113.200,00	9,58			-						104.374,42	-	-	125.948,35	24.783,01		86.978,68	-	-	86.978,68	936.247,32	162,18	3,45					
					201,23			-	-														69,36	56.416,71		-	66.612,25
113.220,00	10,54			-						104.575,65	-	-	125.948,35	24.783,01		87.146,38	-	-	87.146,38	936.415,02	167,70	3,48					
					220,25			-	-														69,83	56.486,54		-	66.612,25
113.240,00	11,48			-						104.795,90	-	-	125.948,35	24.783,01		87.329,92	-	-	87.329,92	936.598,56	183,54	3,50					
					232,88			-	-														71,63	56.558,17		-	66.612,25
113.260,00	11,81			-						105.028,78	-	-	125.948,35	24.783,01		87.523,98	-	-	87.523,98	936.792,62	194,06	3,67					
					238,78			-	-														72,54	56.630,71		-	66.612,25
113.280,00	12,07			-						105.267,56	-	-	125.948,35	24.783,01		87.722,97	-	-	87.722,97	936.991,61	198,99	3,59					
					244,24			-	-														70,83	56.701,54		-	66.612,25
113.300,00	12,35			-						105.511,80	-	-	125.948,35	24.783,01		87.926,50	-	-	87.926,50	937.195,14	203,53	3,49					
					252,09			-	-														69,78	56.771,32		-	66.612,25
113.320,00	12,86			-						105.763,89	-	-	125.948,35	24.783,01		88.136,58	-	-	88.136,58	937.405,22	210,08	3,48					
					263,59			-	-														69,69	56.841,01		-	66.612,25
113.340,00	13,50			-						106.027,48	-	-	125.948,35	24.783,01		88.356,23	-	-	88.356,23	937.624,87	219,65	3,48					
					108,37			-	-														27,10	56.868,11		-	66.612,25
113.347,78	14,37			-						106.135,85	-	-	125.948,35	24.783,01		88.446,54	-	-	88.446,54	937.715,18	90,31	3,48					
					70,71			-	-														16,99	56.885,10		-	66.612,25
113.352,62	14,81			-						106.206,56	-	-	125.948,35	24.783,01		88.505,47	-	-	88.505,47	937.774,11	58,93	3,53					
					72,14			-	-														16,98	56.902,08		-	66.612,25
113.357,47	14,96			-						106.278,70	-	-	125.948,35	24.783,01		88.565,58	-	-	88.565,58	937.834,22	60,11	3,48					
					38,01			-	-														8,88	56.910,96		-	66.612,25
113.360,00	15,07			-						106.316,71	-	-	125.948,35	24.783,01		88.597,26	-	-	88.597,26	937.865,90	31,68	3,54					
					304,51			-	-														70,18	56.981,14		-	66.612,25
113.380,00	15,38			-						106.621,22	-	-	125.948,35	24.783,01		88.851,02	-	-	88.851,02	938.119,66	253,76	3,48					
					301,96			-	-														71,81	57.052,95		-	66.612,25
113.400,00	14,82			-						106.923,18	-	-	125.948,35	24.783,01		89.102,65	-	-	89.102,65	938.371,29	251,63	3,70					
					292,24			-	-														73,99	57.126,94		-	66.612,25
113.420,00	14,41			-						107.215,42	-	-	125.948,35	24.783,01		89.346,18	-	-	89.346,18	938.614,82	243,53	3,70					
					268,17			-	-														73,99	57.200,93		-	66.612,25
113.440,00	12,41			-						107.483,59	-	-	125.948,35	24.783,01		89.569,66	-	-	89.569,66	938.838,30	223,48	3,70					
					234,24			-	-														73,51	57.274,44		-	66.612,25
113.460,00	11,02			-						107.717,83	-	-	125.948,35	24.783,01		89.764,86	-	-	89.764,86	939.033,50	195,20	3,65					
					214,09			-	-														71,33	57.345,77		-	66.612,25
113.480,00	10,39			-						107.931,92	-	-	125.948,35	24.783,01		89.943,27	-	-	89.943,27	939.211,91	178,41	3,48					
					100,06			-	-														33,46	57.379,23		-	66.612,25
113.489,61	10,43			-						108.031,98	-	-	125.948,35	24.783,01		90.026,65	-	-	90.026,65	939.295,29	83,38	3,48					
					77,57			-	-														25,53	57.404,76		-	66.612,25
113.496,84	10,61			-						108.109,55	-	-	125.948,35	24.783,01		90.091,29	-	-	90.091,29	939.359,93	64,64	3,47					
					34,07			-	-														11,00	57.415,76		-	66.612,25
113.500,00	10,55			-						108.143,62	-	-	125.948,35	24.783,01		90.119,68	-	-	90.119,68	939.388,32	28,39	3,39					
					45,15			-	-														14,41	57.430,17		-	66.612,25
113.504,08	11,16			-						108.188,77	-	-	125.948,35	24.783,01		90.157,31	-	-	90.157,31	939.425,95	37,63	3,57					
					193,62			-	-														60,17	57.490,34		-	66.612,25
113.520,00	13,15			-						108.382,39	-	-	125.948,35	24.783,01		90.318,66	-	-	90.318,66	939.587,30	161,35	3,99					
					140,16			0,02	0,02														39,70	57.530,04		-	66.612,25
113.529,74	15,64			-						108.522,55	-	-	125.948,37	24.783,01		90.435,46	-	-	90.435,46	939.704,08	116,80	4,17					
					121,10			0,02	0,02														31,29	57.561,33		-	66.612,25
113.537,43	16,84			-						108.643,65	-	-	125.948,39	24.783,01		90.536,38	-	-	90.536,38	939.804,98	100,92	4,20					
					43,02			0,01	0,01														10,67	57.572,00		-	66.612,25
113.540,00	16,58			0,01						108.686,67	-	-	125.948,38	24.783,03		90.572,22	-	-	90.572,22	939.840,81	35,84	4,09					

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa		Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada		Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)		Áreas (m²)	Volume Parcial	Volume Acumulad	Áreas (m²)	Volume Parcial	Volume Acumulad
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)								
					83,53			0,10	0,10													20,42	57.592,42		-	66.612,25
113.545,12	17,16			0,03						108.770,20	-	-	125.948,38	24.783,13	90.641,83	-	-	90.641,83	939.910,32	69,61	4,15			-		
					267,37			0,24	0,24													62,54	57.654,96		-	66.612,25
113.560,00	18,76			-						109.037,57	-	-	125.948,40	24.783,35	90.864,64	-	-	90.864,64	940.132,89	222,81	4,26			-		
					384,90			0,02	0,02													86,22	57.741,18		-	66.612,25
113.580,00	19,73			-						109.422,47	-	-	125.948,42	24.783,35	91.185,39	-	-	91.185,39	940.453,62	320,75	4,36			-		
					396,42			-	-													87,27	57.828,45		-	66.612,25
113.600,00	19,92			-						109.818,89	-	-	125.948,42	24.783,35	91.515,74	-	-	91.515,74	940.783,97	330,35	4,36			-		
					399,02			-	-													87,27	57.915,72		-	66.612,25
113.620,00	19,99			-						110.217,91	-	-	125.948,42	24.783,35	91.848,26	-	-	91.848,26	941.116,49	332,52	4,36			-		
					199,86			-	-													43,64	57.959,36		-	66.612,25
113.640,00	-			-						110.417,77	-	-	125.948,42	24.783,35	92.014,81	-	-	92.014,81	941.283,04	166,55	-			-		

CUBAÇÃO - LINHA 04

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa Ordenada	Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)					Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9								
400.000,00	37,45			85,55						-	-	-	-	-		-	-	-	-	1.000.000,00	8,81			28,64		
					854,77			1.854,83	712,31													182,16	182,16		672,61	672,61
400.020,00	48,03			99,93						854,77	-	-	1.737,47	117,36		712,31	-	-	712,31	998.857,48	9,41			38,62		
					250,90			506,49	209,08													47,82	229,98		203,07	875,68
400.025,08	50,69			99,36						1.105,67	-	-	2.214,13	147,19		921,39	-	-	921,39	998.560,07	9,41			41,28		
					286,69			571,74	238,91													55,57	285,55		231,11	1.106,79
400.030,78	46,88			98,52						1.392,36	-	-	2.752,46	180,60		1.160,30	-	-	1.160,30	998.227,24	9,62			37,25		
					279,82			573,71	233,18													56,81	342,36		223,00	1.329,79
400.036,47	48,43			99,63						1.672,18	-	-	3.292,75	214,02		1.393,48	-	-	1.393,48	997.886,71	9,79			38,64		
					170,61			351,49	142,18													34,48	376,84		136,13	1.465,92
400.040,00	48,27			99,61						1.842,79	-	-	3.623,54	234,72		1.535,66	-	-	1.535,66	997.677,40	9,75			38,52		
					161,01			334,72	134,18													32,85	409,69		128,16	1.594,08
400.043,38	46,97			98,41						2.003,80	-	-	3.938,42	254,56		1.669,83	-	-	1.669,83	997.476,85	9,68			37,29		
					827,83			1.693,77	689,86													165,45	575,14		662,38	2.256,46
400.060,00	48,93			99,74						2.831,63	-	-	5.534,67	352,08		2.359,69	-	-	2.359,69	996.472,94	9,66			39,27		
					602,41			1.313,31	502,01													125,93	701,07		476,48	2.732,94
400.072,72	41,98			99,47						3.434,04	-	-	6.773,34	426,72		2.861,70	-	-	2.861,70	995.661,64	9,56			32,42		
					325,69			714,91	271,41													71,96	773,03		253,74	2.986,68
400.080,00	43,96			89,88						3.759,73	-	-	7.445,53	469,44		3.133,11	-	-	3.133,11	995.218,14	9,62			34,34		
					1.139,15			1.721,54	949,29													197,65	970,68		941,50	3.928,18
400.100,00	64,30			77,48						4.898,88	-	-	9.049,71	586,80		4.082,40	-	-	4.082,40	994.445,89	9,56			54,74		
					137,66			157,48	114,72													19,67	990,35		117,99	4.046,17
400.102,06	69,59			75,69						5.036,54	-	-	9.195,13	598,86		4.197,12	-	-	4.197,12	994.403,13	9,57			60,02		
					1.016,04			1.302,63	846,70													165,15	1.155,50		850,89	4.897,06
400.120,00	43,66			69,51						6.052,58	-	-	10.392,46	704,16		5.043,82	-	-	5.043,82	993.947,20	8,84			34,82		
					586,69			943,16	488,91													111,17	1.266,67		475,52	5.372,58
400.132,92	47,18			76,53						6.639,27	-	-	11.259,82	779,96		5.532,72	-	-	5.532,72	993.492,94	8,37			38,81		
					359,04			565,17	299,20													59,92	1.326,59		299,13	5.671,71
400.140,00	52,29			82,56						6.998,31	-	-	11.783,43	821,52		5.831,92	-	-	5.831,92	993.226,97	8,33			43,96		
					897,81			1.305,80	748,18													163,99	1.490,58		733,63	6.405,34
400.160,00	36,13			47,74						7.896,12	-	-	12.971,87	938,88		6.580,10	-	-	6.580,10	992.669,35	7,88			28,23		
					163,70			204,80	136,42													35,63	1.526,21		127,91	6.533,25
400.164,52	35,35			43,05						8.059,82	-	-	13.150,13	965,42		6.716,52	-	-	6.716,52	992.600,97	7,73			27,57		
					600,54			613,13	500,45													119,03	1.645,24		479,21	7.012,46
400.180,00	41,22			36,69						8.660,36	-	-	13.672,44	1.056,24		7.216,97	-	-	7.216,97	992.488,29	7,51			33,46		
					615,53			517,30	512,94													115,14	1.760,38		493,30	7.505,76
400.196,13	34,23			28,22						9.275,89	-	-	14.095,11	1.150,87		7.729,91	-	-	7.729,91	992.483,93	6,67			26,94		
					132,88			109,69	109,69													25,76	1.786,14		104,56	7.610,32
400.200,00	34,38			28,41						9.408,77	-	-	14.182,07	1.173,60		7.840,64	-	-	7.840,64	992.484,97	6,63			27,05		
					402,61			327,34	327,34													74,82	1.860,96		323,54	7.933,86
400.212,04	32,51			25,97						9.811,38	-	-	14.438,77	1.244,24		8.176,15	-	-	8.176,15	992.493,14	5,80			26,70		
					197,29			198,85	164,41													41,80	1.902,76		155,49	8.089,35
400.220,00	17,21			24,71						10.008,67	-	-	14.590,90	1.290,96		8.340,56	-	-	8.340,56	992.458,70	4,78			12,42		
					326,43			468,66	272,03													92,02	1.994,78		231,99	8.321,34
400.240,00	15,85			22,88						10.335,10	-	-	14.942,20	1.408,32		8.612,58	-	-	8.612,58	992.262,06	4,53			11,07		
					311,20			415,00	259,33													89,54	2.084,32		215,46	8.536,80
400.260,00	15,59			19,27						10.646,30	-	-	15.239,84	1.525,68		8.871,92	-	-	8.871,92	992.106,40	4,53			10,68		
					282,98			353,41	235,82													88,76	2.173,08		188,15	8.724,95
400.280,00	13,00			16,59						10.929,28	-	-	15.475,89	1.643,04		9.107,73	-	-	9.107,73	991.988,80	4,45			8,32		
					266,50			163,62	163,62													78,98	2.252,06		142,38	8.867,33
400.300,00	13,84			-						11.195,78	-	-	15.522,15	1.760,40		9.329,82	-	-	9.329,82	992.047,27	3,51			6,03		
					392,28			-	-													70,45	2.322,51		143,98	9.011,31
400.320,00	25,54			-						11.588,06	-	-	15.522,15	1.760,40		9.656,72	-	-	9.656,72	992.374,17	3,56			8,42		
					536,98			-	-													73,23	2.395,74		132,25	9.143,56
400.340,00	28,36			-						12.125,04	-	-	15.522,15	1.760,40		10.104,20	-	-	10.104,20	992.821,65	3,79			4,79		
					566,46			-	-													76,59	2.472,33		90,24	9.233,80
400.360,00	28,53			-						12.691,50	-	-	15.522,15	1.760,40		10.576,25	-	-	10.576,25	993.293,70	3,90			4,19		
					570,80			-	-													78,73	2.551,06		79,48	9.313,28
400.380,00	28,80			-						13.262,30	-	-	15.522,15	1.760,40		11.051,92	-	-	11.051,92	993.769,37	4,01			3,72		
					546,33			-	-													78,86	2.629,92		68,43	9.381,71
400.400,00	26,05			-						13.808,63	-	-	15.522,15	1.760,40		11.507,19	-	-	11.507,19	994.224,64	3,91			3,09		
					411,26			-	-													63,11	2.693,03		57,60	9.439,31
400.416,26	24,70			-						14.219,89	-	-	15.522,15	1.760,40		11.849,91	-	-	11.849,91	994.567,36	3,88			3,95		
					91,45			-	-													14,19	2.707,22		15,11	9.454,42
400.420,00	24,16			-						14.311,34	-	-	15.522,15	1.760,40		11.926,12	-	-	11.926,12	994.643,57	3,70			4,12		
					479,60			-	-													74,99	2.782,21		89,26	9.543,68
400.440,00	23,89			-						14.790,94	-	-	15.522,15	1.760,40		12.325,78	-	-	12.325,78	995.043,23	3,83			4,72		
					431,50			-	-													76,10	2.858,31		66,61	9.610,29
400.460,00	19,35			-						15.222,44	-	-	15.522,15	1.760,40		12.685,37	-	-	12.685,37	995.402,82	3,81			1,88		
					368,05			-	-													75,83	2.934,14		35,41	9.645,70
400.480,00	17,54			-						15.590,49	-	-	15.522,15	1.760,40		12.992,08	-	-	12.992,08	995.709,53	3,80			1,63		
					340,42			-	-													73,91	3.008,05		42,29	9.687,99
400.500,00	16,58			-						15.930,91	-	-	15.522,15	1.760,40		13.275,76	-	-	13.275,76	995.993,21	3,61			2,59		
					317,31			-	-													72,26	3.080,31		46,27	9.734,26
400.520,00	15,24			-						16.248,22	-	-	15.522,15	1.760,40		13.540,18	-	-	13.540,18	996.257,63	3,63			2,07		
					276,26			-	-													70,84	3.151,15		21,04	9.755,30
400.540,00	12,46			-						16.524,48	-	-	15.522,15	1.760,40		13.770,40	-	-	13.770,40	996.487,85	3,47			0,06		
					239,23			-	-													67,66	3.218,81		12,38	9.767,68
400.560,00	11,53			-						16.763,71	-	-	15.522,15	1.760,40		13.969,76	-	-	13.969,76	996.687,21	3,32			1,19		
					220,41			-	-													66,80	3.285,61		30,39	9.798,07
400.580,00	10,60			-						16.984,12	-	-	15.522,15	1.760,40		14.153,43	-	-	14.153,43	996.870,88	3,38			1,89		
					205,45			-	-													65,19	3.350,80		43,19	9.841,26
400.600,00	10,05			-						17.189,57	-	-	15.522,15	1.760,40		14.324,64	-	-	14.324,64	997.042,09	3,15			2,50		
					189,57			-	-													62,69	3.413,49		43,94	9.885,20

CUBAÇÃO - LINHA 04

Estaca (km)	Áreas (m²)				Volumes Geométricos											Volume Homogeneizado				Diagrama de Massa Ordenada	Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)						Volume Acumulado (m³)					Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro			1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final		1,2	1,15	0,9								
400.620,00	8,99			-						17.379,14	-	-	15.522,15	1.760,40		14.482,62	-	-	14.482,62	997.200,07	3,13			1,95		
					4,33			-	-													1,51	3.415,00		0,95	9.886,15
400.620,48	9,21			-						17.383,47	-	-	15.522,15	1.760,40		14.486,23	-	-	14.486,23	997.203,68	3,20			2,03		
					210,59			-	-													64,72	3.479,72		45,36	9.931,51
400.640,00	12,37			-						17.594,06	-	-	15.522,15	1.760,40		14.661,72	-	-	14.661,72	997.379,17	3,43			2,62		
					223,39			-	-													67,15	3.546,87		26,19	9.957,70
400.660,00	9,97			-						17.817,45	-	-	15.522,15	1.760,40		14.847,88	-	-	14.847,88	997.565,33	3,29			-		
					146,07			-	-													48,16	3.595,03		-	9.957,70
400.674,50	10,17			-						17.963,52	-	-	15.522,15	1.760,40		14.969,60	-	-	14.969,60	997.687,05	3,35			-		
					55,68			-	-													18,26	3.613,29		-	9.957,70
400.680,00	10,16			-						18.019,20	-	-	15.522,15	1.760,40		15.016,00	-	-	15.016,00	997.733,45	3,32			-		
					204,52			-	-													67,54	3.680,83		-	9.957,70
400.700,00	10,37			-						18.223,72	-	-	15.522,15	1.760,40		15.186,43	-	-	15.186,43	997.903,88	3,46			-		
					165,71			-	-													54,28	3.735,11		-	9.957,70
400.716,21	10,15			-						18.389,43	-	-	15.522,15	1.760,40		15.324,53	-	-	15.324,53	998.041,98	3,25			-		
					38,61			-	-													12,59	3.747,70		-	9.957,70
400.720,00	10,31			-						18.428,04	-	-	15.522,15	1.760,40		15.356,70	-	-	15.356,70	998.074,15	3,42			-		
					204,79			-	-													67,95	3.815,65		-	9.957,70
400.740,00	10,26			-						18.632,83	-	-	15.522,15	1.760,40		15.527,36	-	-	15.527,36	998.244,81	3,41			-		
					180,92			-	-													60,54	3.876,19		-	9.957,70
400.757,92	10,01			-						18.813,75	-	-	15.522,15	1.760,40		15.678,12	-	-	15.678,12	998.395,57	3,37			-		
					20,73			-	-													7,00	3.883,19		-	9.957,70
400.760,00	9,91			-						18.834,48	-	-	15.522,15	1.760,40		15.695,40	-	-	15.695,40	998.412,85	3,35			-		
					191,19			-	-													67,23	3.950,42		-	9.957,70
400.780,00	9,21			-						19.025,67	-	-	15.522,15	1.760,40		15.854,72	-	-	15.854,72	998.572,17	3,37			-		
					96,02			-	-													33,99	3.984,41		-	9.957,70
400.790,43	9,20			-						19.121,69	-	-	15.522,15	1.760,40		15.934,74	-	-	15.934,74	998.652,19	3,15			-		
					90,97			-	-													31,85	4.016,26		-	9.957,70
400.800,00	9,93			-						19.212,66	-	-	15.522,15	1.760,40		16.010,55	-	-	16.010,55	998.728,00	3,55			-		
					173,69			-	-													73,80	4.090,06		-	9.957,70
400.820,00	7,44			-						19.386,35	-	-	15.522,15	1.760,40		16.155,29	-	-	16.155,29	998.872,74	3,83			-		
					144,28			-	-													73,46	4.163,52		-	9.957,70
400.837,69	8,87			-						19.530,63	-	-	15.522,15	1.760,40		16.275,53	-	-	16.275,53	998.992,98	4,48			-		
					20,73			-	-													10,45	4.173,97		-	9.957,70
400.840,00	9,04			-						19.551,36	-	-	15.522,15	1.760,40		16.292,80	-	-	16.292,80	999.010,25	4,55			-		
					8,53			-	-													4,26	4.178,23		-	9.957,70
400.840,95	8,97			-						19.559,89	-	-	15.522,15	1.760,40		16.299,91	-	-	16.299,91	999.017,36	4,45			-		
					29,51			-	-													14,49	4.192,72		-	9.957,70
400.844,21	9,21			-						19.589,40	-	-	15.522,15	1.760,40		16.324,50	-	-	16.324,50	999.041,95	4,58			-		
					125,20			-	-													72,14	4.264,86		-	9.957,70
400.860,00	6,65			-						19.714,60	-	-	15.522,15	1.760,40		16.428,83	-	-	16.428,83	999.146,28	4,56			-		
					138,26			-	-													99,20	4.364,06		-	9.957,70
400.880,00	7,18			-						19.852,86	-	-	15.522,15	1.760,40		16.544,05	-	-	16.544,05	999.261,50	5,36			-		
					148,31			-	-													113,08	4.477,14		-	9.957,70
400.900,00	7,65			-						20.001,17	-	-	15.522,15	1.760,40		16.667,64	-	-	16.667,64	999.385,09	5,94			-		
					162,48			-	-													127,63	4.604,77		-	9.957,70
400.920,00	8,59			-						20.163,65	-	-	15.522,15	1.760,40		16.803,04	-	-	16.803,04	999.520,49	6,82			-		
					265,21			-	-													140,55	4.745,32		72,33	10.030,03
400.940,00	17,93			-						20.428,86	-	-	15.522,15	1.760,40		17.024,05	-	-	17.024,05	999.741,50	7,24			7,23		
					341,36			-	-													143,97	4.889,29		135,91	10.165,94
400.960,00	16,21			-						20.770,22	-	-	15.522,15	1.760,40		17.308,52	-	-	17.308,52	1.000.025,97	7,16			6,36		
					338,78			-	-													144,31	5.033,60		152,07	10.318,01
400.980,00	17,67			-						21.109,00	-	-	15.522,15	1.760,40		17.590,83	-	-	17.590,83	1.000.308,28	7,27			8,85		
					354,76			-	-													151,28	5.184,88		164,87	10.482,88
401.000,00	17,81			-						21.463,76	-	-	15.522,15	1.760,40		17.886,47	-	-	17.886,47	1.000.603,92	7,86			7,64		
					232,80			-	-													92,27	5.277,15		112,65	10.595,53
401.011,95	21,15			-						21.696,56	-	-	15.522,15	1.760,40		18.080,47	-	-	18.080,47	1.000.797,92	7,58			11,21		
					158,49			-	-													56,75	5.333,90		84,97	10.680,50
401.020,00	20,75			-						21.855,05	-	-	15.522,15	1.760,40		18.212,54	-	-	18.212,54	1.000.929,99	7,64			11,25		
					636,17			89,42	89,42													142,49	5.476,39		463,89	11.144,39
401.040,00	48,08			8,88						22.491,22	-	-	15.522,77	1.849,20		18.742,68	-	-	18.742,68	1.001.370,71	7,72			39,13		
					505,94			108,67	108,67													79,18	5.555,57		413,64	11.558,03
401.051,01	52,57			10,94						22.997,16	-	-	15.566,82	1.913,82		19.164,30	-	-	19.164,30	1.001.683,66	7,76			43,47		
					437,69			91,13	91,13													64,91	5.620,48		350,47	11.908,50
401.060,00	54,70			9,77						23.434,85	-	-	15.605,21	1.966,56		19.529,04	-	-	19.529,04	1.001.957,27	7,78			43,15		
					950,95			178,84	178,84													145,51	5.765,99		693,72	12.602,22
401.080,00	48,74			8,79						24.385,80	-	-	15.666,69	2.083,92		20.321,50	-	-	20.321,50	1.002.570,89	7,86			33,35		
					410,92			80,67	80,67													74,01	5.840,00		252,98	12.855,20
401.090,07	37,97			8,01						24.796,72	-	-	15.688,25	2.143,03		20.663,93	-	-	20.663,93	1.002.832,65	7,92			20,73		
					314,72			76,65	76,65													78,31	5.918,31		151,82	13.007,02
401.100,00	25,44			7,44						25.111,44	-	-	15.706,65	2.201,28		20.926,20	-	-	20.926,20	1.003.018,27	7,86			9,86		
					453,45			141,13	141,13													158,29	6.076,60		165,81	13.172,83
401.120,00	19,90			6,68						25.564,89	-	-	15.730,42	2.318,64		21.304,08	-	-	21.304,08	1.003.255,02	7,97			6,72		
					445,93			129,12	129,12													158,12	6.234,72		129,66	13.302,49
401.140,00	24,69			6,24						26.010,82	-	-	15.742,18	2.436,00		21.675,68	-	-	21.675,68	1.003.497,50	7,85			6,24		
					246,91			62,35	62,35													78,46	6.313,18		62,43	13.364,92
401.160,00	-			-						26.257,73	-	-	15.742,13	2.498,40		21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-													-	6.313,18		-	13.364,92
401.180,00	-			-						26.257,73	-	-	15.742,13	2.498,40		21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-													-	6.313,18		-	13.364,92
401.200,00	-			-						26.257,73	-	-	15.742,13	2.498,40		21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-													-	6.313,18		-	13.364,92
401.220,00	-			-						26.257,73	-	-	15.742,13	2.498,40		21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-													-	6.313,18		-	13.364,92

CUBAÇÃO - LINHA 04

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa	Volumes Geométricos					
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada	Camada Vegetal			Escalonamento		
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total	(m³)	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado	Áreas (m²)	Volume Parcial (m³)	Volume Acumulado
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)							
401.240,00	-			-						26.257,73	-	-	15.742,13	2.498,40	21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-												-	6.313,18		-	13.364,92
401.260,00	-			-						26.257,73	-	-	15.742,13	2.498,40	21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-												-	6.313,18		-	13.364,92
401.280,00	-			-						26.257,73	-	-	15.742,13	2.498,40	21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-												-	6.313,18		-	13.364,92
401.300,00	-			-						26.257,73	-	-	15.742,13	2.498,40	21.881,44	-	-	21.881,44	1.003.640,91	-			-		
					-			-	-												-	6.313,18		-	13.364,92
401.314,54	-			-						26.257,73	-	-	15.742,13	2.498,40	21.881,44	-	-	21.881,44	1.003.640,91	-			-		

CUBAÇÃO - DESVIO PROVISÓRIO

Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa Ordenada
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				
	Corte			Aterro	Corte			Aterro	Comp. Lateral	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total	(m³)
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9	(Homog.)	
-	3,34			-						-	-	-	-	-	-	-	-	-	1.000.000,00
					18,42			-	-										
5,78	3,04			-						18,42	-	-	-	-	15,35	-	-	15,35	1.000.015,35
					38,31			1,44	-										
20,00	2,32			0,21						56,73	-	-	- 0,05	1,49	47,28	-	-	47,28	1.000.045,84
					11,39			3,05	-										
24,92	2,27			1,06						68,12	-	-	- 0,13	4,62	56,77	-	-	56,77	1.000.052,28
					20,81			60,12	-										
40,00	0,46			7,13						88,93	-	-	- 1,75	66,36	74,11	-	-	74,11	1.000.009,50
					3,57			31,29	-										
44,07	1,27			8,69						92,50	-	-	5,67	90,23	77,08	-	-	77,08	999.981,18
					10,72			212,90	-										
60,00	0,08			18,04						103,22	-	-	125,08	183,72	86,02	-	-	86,02	999.777,22
					0,46			182,67	-										
71,51	-			13,70						103,68	-	-	240,20	251,27	86,40	-	-	86,40	999.594,93
					1,57			103,44	-										
80,00	0,38			10,39						105,25	-	-	293,83	301,08	87,71	-	-	87,71	999.492,80
					7,83			78,83	-										
92,29	0,92			2,26						113,08	-	-	300,53	373,21	94,23	-	-	94,23	999.420,49
					7,71			8,90	-										
100,00	1,10			-						120,79	-	-	300,72	381,92	100,66	-	-	100,66	999.418,02
					21,51			-	-										
113,07	2,20			-						142,30	-	-	300,72	381,92	118,58	-	-	118,58	999.435,94
					16,24			-	-										
120,00	2,48			-						158,54	-	-	300,72	381,92	132,12	-	-	132,12	999.449,48
					38,96			-	-										
140,00	1,41			-						197,50	-	-	300,72	381,92	164,58	-	-	164,58	999.481,94
					41,42			-	-										
160,00	2,73			-						238,92	-	-	300,72	381,92	199,10	-	-	199,10	999.516,46
					70,62			-	-										
180,00	4,33			-						309,54	-	-	300,72	381,92	257,95	-	-	257,95	999.575,31
					60,75			-	-										
200,00	1,74			-						370,29	-	-	300,72	381,92	308,58	-	-	308,58	999.625,94
					0,90			-	-										
200,52	1,70			-						371,19	-	-	300,72	381,92	309,32	-	-	309,32	999.626,68
					18,37			0,32	-										
220,00	0,19			0,03						389,56	-	-	300,74	382,22	324,63	-	-	324,63	999.641,67
					25,09			2,52	-										
240,00	2,31			0,22						414,65	-	-	300,76	384,72	345,54	-	-	345,54	999.660,06
					37,58			11,61	-										
260,00	1,43			0,95						452,23	-	-	300,67	396,42	376,86	-	-	376,86	999.679,77
					33,29			21,70	-										
280,00	1,88			1,24						485,52	-	-	300,47	418,32	404,60	-	-	404,60	999.685,81
					11,64			6,55	-										
285,67	2,22			1,07						497,16	-	-	300,48	424,86	414,30	-	-	414,30	999.688,96
					30,08			10,97	-										
300,00	1,96			0,47						527,24	-	-	300,41	435,90	439,37	-	-	439,37	999.703,06
					34,15			8,79	-										
320,00	1,45			0,41						561,39	-	-	300,40	444,70	467,82	-	-	467,82	999.722,72
					42,99			4,09	-										
340,00	2,85			-						604,38	-	-	300,39	448,80	503,65	-	-	503,65	999.754,46
					52,26			-	-										
360,00	2,38			-						656,64	-	-	300,39	448,80	547,20	-	-	547,20	999.798,01
					28,62			0,45	-										
370,82	2,92			0,08						685,26	-	-	300,41	449,23	571,05	-	-	571,05	999.821,41
					26,77			0,40	-										
380,00	2,91			0,01						712,03	-	-	300,40	449,64	593,36	-	-	593,36	999.843,32
					65,74			0,05	-										
400,00	3,66			-						777,77	-	-	300,35	449,74	648,14	-	-	648,14	999.898,05
					70,61			0,30	-										
420,00	3,40			0,03						848,38	-	-	300,35	450,04	706,98	-	-	706,98	999.956,59

CUBAÇÃO - AV. HIGINO CUNHA																			
Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada
	Corte			Aterro	Corte			Aterro	Comp. Lateral 1ª Cat	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9		
0+000,00	0,19			0,52						-	-	-	-	-	-	-	-	-	1.000.000,00
					2,97			15,79	2,48										
0+020,00	0,11			1,06						2,97	-	-	15,79	-	2,48	-	-	2,48	999.984,21
					1,33			8,26	1,11										
0+029,24	0,18			0,73						4,30	-	-	15,78	8,27	3,58	-	-	3,58	999.975,95
					2,46			5,12	2,05										
0+037,20	0,44			0,56						6,76	-	-	15,77	13,40	5,63	-	-	5,63	999.970,83
					1,41			1,42	1,18										
0+040,00	0,57			0,45						8,17	-	-	15,77	14,82	6,81	-	-	6,81	999.969,41
					3,93			1,83	1,83										
0+045,15	0,95			0,26						12,10	-	-	15,77	16,65	10,08	-	-	10,08	999.967,58
					18,99			1,90	1,90										
0+060,00	1,60			-						31,09	-	-	15,74	18,58	25,91	-	-	25,91	999.965,68
					18,48			-	-										
0+067,41	3,38			-						49,57	-	-	15,74	18,58	41,31	-	-	41,31	999.965,68
					39,08			-	-										
0+076,11	5,60			-						88,65	-	-	15,74	18,58	73,88	-	-	73,88	999.965,68
					22,52			-	-										
0+080,00	5,98			-						111,17	-	-	15,74	18,58	92,64	-	-	92,64	999.965,68
					30,26			-	-										
0+084,81	6,61			-						141,43	-	-	15,74	18,58	117,86	-	-	117,86	999.965,68
					126,59			-	-										
0+100,00	10,06			-						268,02	-	-	15,74	18,58	223,35	-	-	223,35	999.965,68
					274,46			-	-										
0+120,00	17,38			-						542,48	-	-	15,74	18,58	452,07	-	-	452,07	999.965,68
					468,38			-	-										
0+140,00	29,45			-						1.010,86	-	-	15,74	18,58	842,38	-	-	842,38	999.965,68
					732,03			-	-										
0+160,00	43,75			-						1.742,89	-	-	15,74	18,58	1.452,41	-	-	1.452,41	999.965,68
					1.004,09			-	-										
0+180,00	56,66			-						2.746,98	-	-	15,74	18,58	2.289,15	-	-	2.289,15	999.965,68
					1.208,63			-	-										
0+200,00	64,20			-						3.955,61	-	-	15,74	18,58	3.296,34	-	-	3.296,34	999.965,68
					791,41			-	-										
0+212,10	66,57			-						4.747,02	-	-	15,74	18,58	3.955,85	-	-	3.955,85	999.965,68
					533,42			-	-										
0+220,00	68,53			-						5.280,44	-	-	15,74	18,58	4.400,37	-	-	4.400,37	999.965,68
					1.475,20			-	-										
0+240,00	78,99			-						6.755,64	-	-	15,74	18,58	5.629,70	-	-	5.629,70	999.965,68
					172,83			-	-										
0+242,10	85,34			-						6.928,47	-	-	15,74	18,58	5.773,72	-	-	5.773,72	999.965,68
					1.665,54			-	-										
0+260,00	100,79			-						8.594,01	-	-	15,74	18,58	7.161,68	-	-	7.161,68	999.965,68
					1.908,23			-	-										
0+280,00	90,03			-						10.502,24	-	-	15,74	18,58	8.751,87	-	-	8.751,87	999.965,68
					764,66			-	-										
0+288,50	89,81			-						11.266,90	-	-	15,74	18,58	9.389,08	-	-	9.389,08	999.965,68
					955,93			-	-										
0+300,00	76,49			-						12.222,83	-	-	15,74	18,58	10.185,69	-	-	10.185,69	999.965,68
					1.305,87			-	-										
0+318,50	64,66			-						13.528,70	-	-	15,74	18,58	11.273,92	-	-	11.273,92	999.965,68
					96,03			-	-										
0+320,00	63,67			-						13.624,73	-	-	15,74	18,58	11.353,94	-	-	11.353,94	999.965,68
					1.157,16			-	-										

CUBAÇÃO - AV. HIGINO CUNHA																			
Estaca (km)	Áreas (m²)				Volumes Geométricos										Volume Homogeneizado				Diagrama de Massa
					Volume Parcial (m³)					Volume Acumulado (m³)					Volume Acumulado (m³)				Ordenada
	Corte			Aterro	Corte			Aterro	Comp. Lateral 1ª Cat	Corte			Aterro		1ª Cat.	2ª Cat.	3ª Cat.	Total (Homog.)	(m³)
	1ª Cat	2ª Cat	3ª Cat		1ª Cat	2ª Cat	3ª Cat			1ª Cat	2ª Cat	3ª Cat	Corpo	Cam. Final	1,2	1,15	0,9		
0+340,00	52,05			-						14.781,89	-	-	15,74	18,58	12.318,24	-	-	12.318,24	999.965,68
					908,05			-	-										
0+360,00	38,76			-						15.689,94	-	-	15,74	18,58	13.074,95	-	-	13.074,95	999.965,68
					640,56			-	-										
0+380,00	25,30			-						16.330,50	-	-	15,74	18,58	13.608,75	-	-	13.608,75	999.965,68
					370,81			0,48	0,48										
0+400,00	11,79			0,05						16.701,31	-	-	15,72	19,08	13.917,76	-	-	13.917,76	999.965,20
					183,19			1,35	1,35										
0+420,00	6,53			0,09						16.884,50	-	-	15,67	20,48	14.070,42	-	-	14.070,42	999.963,85
					94,84			0,90	0,90										
0+440,00	2,95			-						16.979,34	-	-	15,67	21,38	14.149,45	-	-	14.149,45	999.962,95
					-			-	-										
0+440,00	2,95			-						16.979,34	-	-	15,67	21,38	14.149,45	-	-	14.149,45	999.962,95