

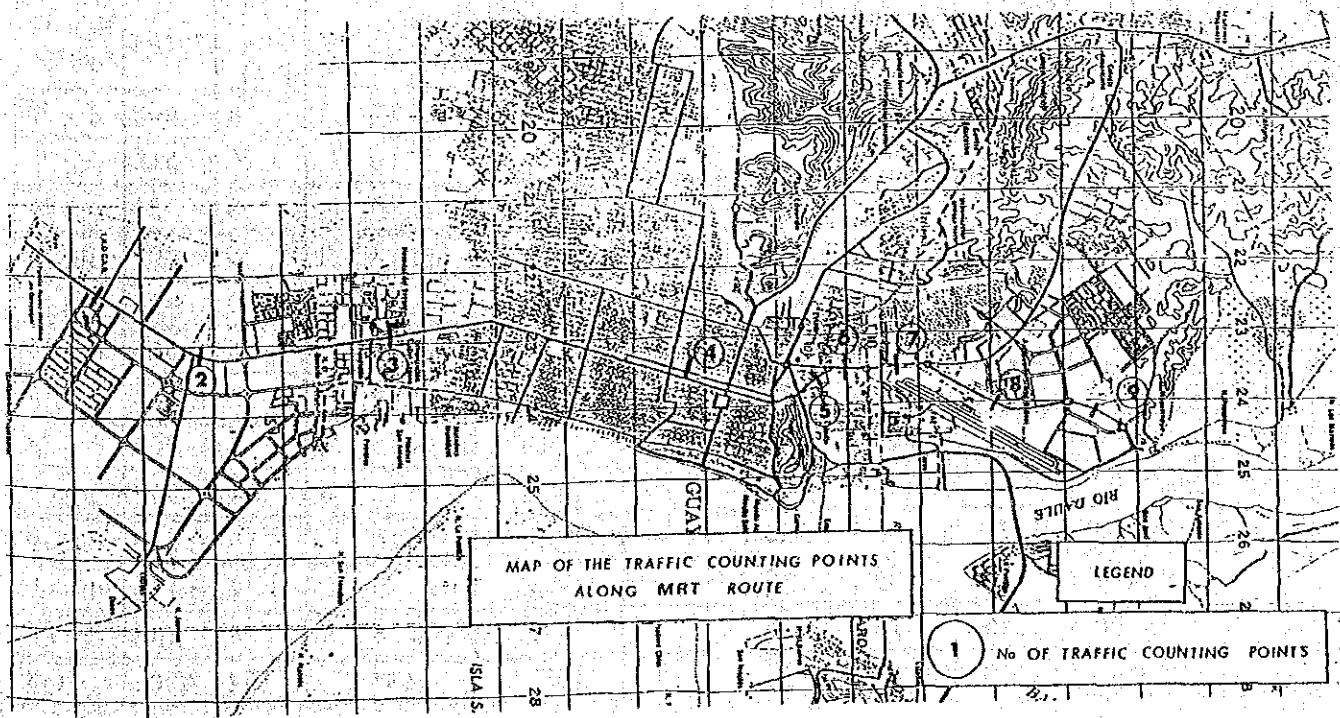
## **APPENDIX**



Appendix 1-1 TRAFFIC VOLUME ALONG MRT ROUTE AND SCREEN LINE

(Survey results are shown in following pages A-2 to A-14.)

Date 1 Nov, 1985



## Section 1 (to North)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		64	54	21	1	8	16	2	166	26
8:00 - 9:00		136	133	42	-	5	28	9	353	23
9:00 - 10:00		95	117	75	-	7	11	6	311	27
10:00 - 11:00		125	108	89	-	11	12	8	353	19
11:00 - 12:00		217	169	122	-	3	17	9	537	32
12:00 - 13:00		115	142	45	-	6	8	7	323	24
13:00 - 14:00		145	156	92	3	8	26	5	435	12
14:00 - 15:00		103	126	92	-	6	7	4	338	17
15:00 - 16:00		129	150	83	1	6	14	7	390	19
16:00 - 17:00		162	219	146	-	6	6	10	549	24
17:00 - 18:00		166	188	49	1	4	12	20	440	17
18:00 - 19:00		59	104	36	2	4	7	3	215	3
TOTAL 12 Hrs.		1516	1666	892	8	74	164	90	4410	242

## Section 1 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		173	126	67	1	12	12	15	405	25
8:00 - 9:00		224	165	92	-	7	16	14	518	20
9:00 - 10:00		134	142	92	-	7	8	8	391	16
10:00 - 11:00		133	101	71	-	4	7	5	305	23
11:00 - 12:00		215	156	100	-	7	8	10	496	22
12:00 - 13:00		102	123	57	-	3	17	4	306	16
13:00 - 14:00		129	119	79	-	7	9	2	651	14
14:00 - 15:00		149	108	80	-	5	16	6	364	24
15:00 - 16:00		114	122	67	-	8	17	14	342	16
16:00 - 17:00		71	90	43	-	5	14	16	239	8
17:00 - 18:00		33	39	30	-	4	5	2	113	8
18:00 - 19:00		46	73	25	-	6	8	6	164	6
TOTAL 12 Hrs.		1523	1363	803	1	75	137	102	4004	198

## Section 2 (to North)

Date 1 Nov. 1985

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		212	387	64	5	45	53	4	770	118
8:00 - 9:00		269	375	105	0	43	61	0	853	81
9:00 - 10:00		234	337	143	5	29	34	0	782	67
10:00 - 11:00		274	291	165	5	31	30	0	796	46
11:00 - 12:00		349	342	179	11	25	37	1	944	61
12:00 - 13:00		338	360	105	14	36	33	5	891	54
13:00 - 14:00		194	296	124	8	27	37	0	686	40
14:00 - 15:00		242	300	174	6	35	27	0	784	77
15:00 - 16:00		292	338	151	11	33	39	1	864	74
16:00 - 17:00		365	402	183	5	49	34	1	1039	90
17:00 - 18:00		322	342	106	9	41	33	2	855	64
18:00 - 19:00		189	318	59	5	36	35	0	642	52
TOTAL 12 Hrs.		3280	4088	1558	84	430	453	14	9907	824

## Section 2 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		405	461	111	14	73	61	1	1126	97
8:00 - 9:00		363	412	142	14	43	58	10	1042	43
9:00 - 10:00		289	348	175	9	37	46	2	906	47
10:00 - 11:00		257	323	157	4	36	26	-	803	57
11:00 - 12:00		291	342	147	1	27	35	2	845	71
12:00 - 13:00		254	345	136	4	29	34	1	803	72
13:00 - 14:00		310	396	141	5	39	35	1	927	81
14:00 - 15:00		235	290	152	8	21	28	1	735	61
15:00 - 16:00		189	322	133	4	29	42	3	722	51
16:00 - 17:00		186	298	116	9	44	38	5	696	53
17:00 - 18:00		144	286	96	4	41	40	3	614	70
18:00 - 19:00		188	367	89	7	27	36	3	717	71
TOTAL 12 Hrs.						446	479	32	9936	

## Section 3 (to North)

Date 1 Nov. 1985

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		638	635	111	97	67	116	39	1703	179
8:00 - 9:00		557	558	166	86	57	83	45	1502	125
9:00 - 10:00		533	551	147	74	44	67	19	1455	91
10:00 - 11:00		619	524	177	68	45	68	13	1514	83
11:00 - 12:00		619	569	174	78	42	70	22	1574	110
12:00 - 13:00		605	559	125	77	40	53	23	1482	78
13:00 - 14:00		578	549	131	66	41	58	31	1454	11
14:00 - 15:00		583	540	176	75	46	66	28	1514	120
15:00 - 16:00		584	537	156	72	47	61	38	1495	107
16:00 - 17:00		575	575	159	87	47	54	43	1540	119
17:00 - 18:00		584	527	130	91	41	76	38	1528	105
18:00 - 19:00		578	569	72	86	41	61	18	1425	86
TOTAL 12 Hrs.		7053	6693	1724	957	558	833	357	18172	1107

## Section 3 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		554	672	114	78	57	70	52	1597	126
8:00 - 9:00		424	527	150	78	45	69	18	1311	75
9:00 - 10:00		407	465	156	62	34	65	12	1263	75
10:00 - 11:00		347	460	165	61	32	47	5	1742	66
11:00 - 12:00		391	478	163	74	33	55	14	1208	102
12:00 - 13:00		427	531	134	48	31	59	13	1243	92
13:00 - 14:00		518	625	214	70	42	55	20	1544	112
14:00 - 15:00		348	451	174	54	24	42	10	1103	76
15:00 - 16:00		375	458	156	68	44	44	21	1166	85
16:00 - 17:00		368	416	131	57	32	50	20	1074	81
17:00 - 18:00		377	430	88	66	41	58	27	1087	93
18:00 - 19:00		495	583	95	59	31	78	14	1355	117
TOTAL 12 Hrs.		5031	6096	1476	775	446	692	226	10242	1100

Section 4 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		234	382	41	97	53	35	2	844	21
8:00 - 9:00		284	334	34	106	48	27	1	833	27
9:00 - 10:00		272	364	38	77	35	17	1	804	65
10:00 - 11:00		307	372	61	109	80	38	-	1047	6
11:00 - 12:00		369	369	43	112	63	41	1	998	107
12:00 - 13:00		341	458	34	126	79	25	4	1067	85
13:00 - 14:00		351	400	60	134	104	28	3	1080	59
14:00 - 15:00		229	261	27	76	35	14	-	642	34
15:00 - 16:00		246	316	43	92	63	35	-	795	72
16:00 - 17:00		250	240	52	136	97	47	3	825	92
17:00 - 18:00		221	252	42	116	90	32	4	757	67
18:00 - 19:00		418	411	49	235	153	62	9	1337	122
TOTAL 12 Hrs.		3522	4159	524	1416	900	401	28	10950	757

Section 4 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		392	394	30	23		2	17	858	44
8:00 - 9:00		422	367	30	24		8		851	33
9:00 - 10:00		381	431	36	16		1	1	866	45
10:00 - 11:00		372	407	27	21		3	1	831	46
11:00 - 12:00		452	411	27	20		8		918	62
12:00 - 13:00		442	452	28	21		6		949	52
13:00 - 14:00		378	345	24	23		8	1	779	42
14:00 - 15:00		303	332	24	34		2		695	34
15:00 - 16:00		395	384	28	19		4		830	40
16:00 - 17:00		489	476	28	25		1	2	1021	81
17:00 - 18:00		424	356	30	31		12	1	854	37
18:00 - 19:00		503	372	18	15		8		916	61
TOTAL 12 Hrs.		4953	4727	330	272		63	23	10368	619

Section 5 (to North)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		548	512	64	59	76	38	5	1302	67
8:00 - 9:00		506	432	50	52	76	31	6	1153	71
9:00 - 10:00		567	489	31	49	71	23	6	1214	72
10:00 - 11:00		654	507	74	47	71	30	7	1390	96
11:00 - 12:00		638	480	76	40	61	26	8	1329	87
12:00 - 13:00		609	490	97	53	76	34	19	1378	99
13:00 - 14:00		357	272	42	29	48	13	8	769	42
14:00 - 15:00		521	415	57	36	58	23	18	1128	46
15:00 - 16:00		616	426	46	49	82	22	8	1249	88
16:00 - 17:00		536	395	50	43	64	26	6	1120	70
17:00 - 18:00		531	381	41	49	87	25	3	1142	75
18:00 - 19:00		536	388	38	46	82	25	6	1121	86
TOTAL 12 Hrs.		6611	5187	666	552	852	316	100	14284	899

Section 5 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		529	187	25	17	52	7	27	844	48
8:00 - 9:00		526	191	52	14	32	2	6	823	56
9:00 - 10:00		516	180	57	17	45	21	2	838	12
10:00 - 11:00		518	140	33	14	32	3	2	742	42
11:00 - 12:00		437	330	43	10	44	7	1	872	54
12:00 - 13:00		454	362	55	10	29	13	2	925	47
13:00 - 14:00		347	330	32	12	27	11	2	761	42
14:00 - 15:00		371	325	58	18	42	6	1	821	56
15:00 - 16:00		374	327	53	12	30	3	1	800	46
16:00 - 17:00		347	349	64	12	34	4	2	812	60
17:00 - 18:00		509	323	32	14	40	5	5	928	60
18:00 - 19:00		514	356	27	13	42	3		955	50
TOTAL 12 Hrs.		5542	3400	531	163	449	85	51	10221	573



Section 6 (to North)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		453	666	48	67	73	31	20	1358	71
8:00 - 9:00		483	587	57	53	85	36	9	1310	58
9:00 - 10:00		469	709	61	52	77	27	8	1430	96
10:00 - 11:00		438	657	65	66	52	34	7	1319	86
11:00 - 12:00		446	718	60	49	57	28	8	1366	74
12:00 - 13:00		295	503	35	45	52	27	10	967	81
13:00 - 14:00		269	431	40	38	64	22	8	872	63
14:00 - 15:00		341	484	36	40	69	24	13	1007	45
15:00 - 16:00		381	499	23	51	78	18	9	1059	70
16:00 - 17:00		425	613	43	49	62	30	8	1230	44
17:00 - 18:00		424	64	32	59	88	39	12	1118	52
18:00 - 19:00		397	468	39	49	79	29	8	1069	71
TOTAL 12 Hrs.		4848	6799	539	618	836	345	120	14105	811

Section 6 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		528	753	28	72	100	53	24	1558	78
8:00 - 9:00		457	790	61	60	70	40	12	1490	104
9:00 - 10:00		535	675	47	70	62	47	10	1446	9
10:00 - 11:00		584	705	44	47	77	35	10	1502	97
11:00 - 12:00		593	609	87	47	61	29	13	1439	96
12:00 - 13:00		853	839	126	110	98	63	27	2116	103
13:00 - 14:00		562	550	77	61	76	27	18	1371	59
14:00 - 15:00		621	798	104	51	82	32	22	1710	95
15:00 - 16:00		520	916	68	49	60	35	18	1666	82
16:00 - 17:00		658	979	72	56	68	48	12	1893	98
17:00 - 18:00		705	941	60	48	61	60	11	1886	82
18:00 - 19:00		421	948	21	46	60	22	11	1239	80
TOTAL 12 Hrs.		7037	9213	795	717	875	491	188	19316	983

Section 7 (to North)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		1090	827	93	38	85	66	10	2209	81
8:00 - 9:00		1101	695	106	42	105	29	5	2083	70
9:00 - 10:00		979	733	126	29	89	46	5	2070	93
10:00 - 11:00		1014	689	144	22	56	48	5	1978	115
11:00 - 12:00		1129	901	135	33	81	19	6	2304	103
12:00 - 13:00		1035	795	108	52	81	32	12	2115	111
13:00 - 14:00		933	635	135	42	84	27	11	1867	82
14:00 - 15:00		905	610	106	38	75	19	8	1761	73
15:00 - 16:00		950	616	131	25	62	37	8	1829	90
16:00 - 17:00		1164	801	148	28	49	70	6	2266	134
17:00 - 18:00		1391	827	119	79	109	30	7	2562	89
18:00 - 19:00		1451	896	87	81	136	35	17	2703	63
TOTAL 12 Hrs.		13142	9025	1438	509	1012	458	100	25684	1104

Section 7 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		807	786	126	143	133	75	32	2102	86
8:00 - 9:00		1056	858	120	124	152	81	37	2428	77
9:00 - 10:00		1010	738	113	72	98	35	11	2077	96
10:00 - 11:00		972	818	139	86	117	62	22	2216	78
11:00 - 12:00		1168	130	1082	113	156	109	30	2788	121
12:00 - 13:00		928	820	135	65	140	103	26	2217	140
13:00 - 14:00		1216	1016	141	95	185	115	23	2791	108
14:00 - 15:00		1015	1010	120	79	180	104	21	2529	94
15:00 - 16:00		989	890	142	90	131	109	18	2369	92
16:00 - 17:00		1256	1178	144	110	246	113	23	3070	160
17:00 - 18:00		1216	756	80	48	85	92	3	2280	93
18:00 - 19:00		1086	637	47	29	52	54	3	1900	86
TOTAL 12 Hrs.		12719	9637	2389	1054	1675	1052	249	28775	1231

Section 8 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		336	316	19	38	74	24	6	813	53
8:00 - 9:00		361	364	22	18	86	22	5	878	45
9:00 - 10:00		371	362	24	16	73	19	7	872	36
10:00 - 11:00		450	376	16	12	76	20	5	955	46
11:00 - 12:00		431	399	27	14	75	24	5	975	39
12:00 - 13:00		345	314	24	14	77	22	6	802	37
13:00 - 14:00		420	303	19	6	78	17	7	850	39
14:00 - 15:00		464	345	19	12	79	22	7	948	45
15:00 - 16:00		478	445	24	15	90	16	6	1074	48
16:00 - 17:00		447	416	29	19	82	17	5	1015	53
17:00 - 18:00		471	405	15	16	92	14	4	1017	48
18:00 - 19:00		394	309	14	18	74	19	5	833	30
TOTAL 12 Hrs.		4968	4354	252	198	956	236	68	11032	519

Section 8 (to North)

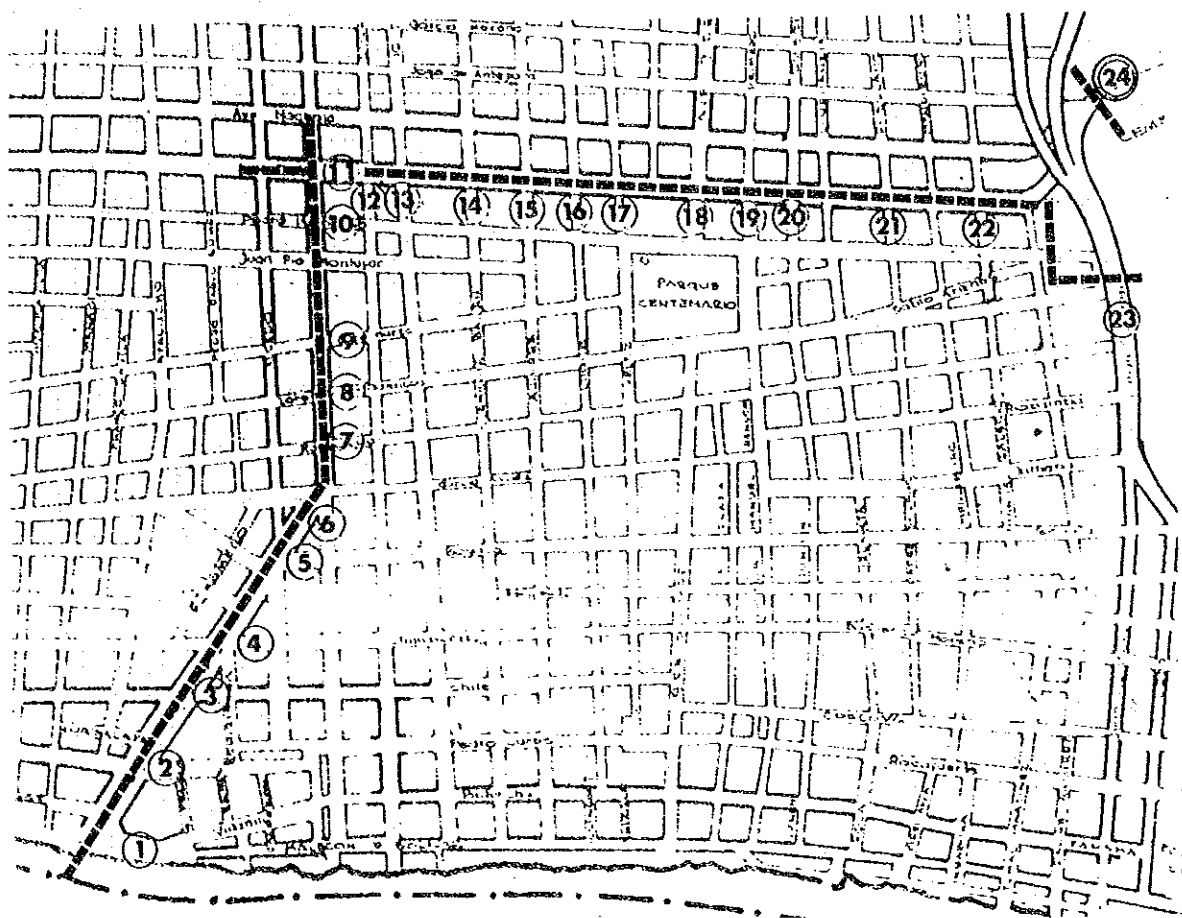
Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		429	387	15	21	112	13	6	983	24
8:00 - 9:00		438	400	19	18	86	16	11	988	33
9:00 - 10:00		426	358	17	16	80	10	11	918	40
10:00 - 11:00		421	340	12	18	93	13	11	908	27
11:00 - 12:00		402	322	17	9	75	9	14	848	35
12:00 - 13:00		361	310	19	11	68	15	7	832	41
13:00 - 14:00		395	287	20	20	83	23	7	835	50
14:00 - 15:00		506	424	15	14	116	13	11	1099	45
15:00 - 16:00		575	405	29	19	75	16	11	1130	44
16:00 - 17:00		512	393	20	19	77	23	8	1052	46
17:00 - 18:00		510	385	22	16	87	14	2	1046	42
18:00 - 19:00		382	315	7	22	85	8	5	824	38
TOTAL 12 Hrs.		5357	4326	212	205	1037	173	114	11424	438

Section 9 (to North)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		261	217	11	16	94	17	13	629	17
8:00 - 9:00		275	252	5	12	101	12	6	663	29
9:00 - 10:00		252	211	20	15	81	9	2	590	27
10:00 - 11:00		289	217	13	12	83	18	3	635	20
11:00 - 12:00		316	237	9	7	73	13	2	657	32
12:00 - 13:00		279	223	7	14	78	11	5	617	37
13:00 - 14:00		281	275	29	8	75	8	3	679	25
14:00 - 15:00		372	286	25	12	102	13	5	815	37
15:00 - 16:00		362	256	18	13	75	12	7	743	30
16:00 - 17:00		327	251	12	15	86	6	4	701	25
17:00 - 18:00		349	250	11	9	92	10	8	729	30
18:00 - 19:00		311	220	13	9	83	10	3	649	39
TOTAL 12 Hrs.		3674	2895	173	142	1023	139	61	8107	348

Section 9 (to South)

Time	Type of Car	Pas-senger car	Light Lorry	Lorry	Buseta	Colectivo		Bus	Total	Motor Cycle
						Especial	Corriente			
7:00 - 8:00		274	226	16	15	91	22		644	54
8:00 - 9:00		236	233	14	156	94	17		610	39
9:00 - 10:00		219	224	15	13	92	14		577	31
10:00 - 11:00		221	189	14	12	83	14		533	26
11:00 - 12:00		227	196	15	9	78	13		538	24
12:00 - 13:00		203	181	14	14	81	16		509	29
13:00 - 14:00		218	165	21	6	68	14		492	12
14:00 - 15:00		222	244	32	7	77	28	4	614	6
15:00 - 16:00		289	261	29	10	96	6		691	41
16:00 - 17:00		259	223	10	11	74	13	3	593	32
17:00 - 18:00		264	194	15	10	83	9	8	583	38
18:00 - 19:00		209	209	11	12	86	12	1	540	24
TOTAL 12 Hrs.		2841	2545	206	135	1003	178	16	6924	356



THE TRAFFIC VOLUME COUNTING POINTS ON THE INTERNAL SCREEN LINE

TRAFFIC VOLUME AT THE SCREEN LINE OF CBD AREA (SOUTH-NORTH SECTION)

(1)

SURVEY POINT N°	TRAFFIC VOLUME			MASTER PLAN STUDY (2)	COMPARISON (1) / (2)	PREVIOUS SURVEY POINT N°
	ENTRY	EXIT	TOTAL(1)			
1	8,889	4,543	13,432	16,262	0.83	D - 1
2	13,890	---	13,890	15,588	0.89	D - 2
3	-----	19,189	19,189	17,723	1.08	D - 3
4	16,967	-----	16,967	29,614	0.82	D - 5
5	-----	14,639	14,639	14,782	0.99	D - 7
6	8,137	-----	8,137	8,667	0.94	D - 8
7	-----	8,476	8,476	8,379	1.02	D - 10
8	10,517	-----	10,517	11,823	0.89	D - 11
9	-----	7,423	7,423	7,702	0.96	D - 12
10	-----	11,736	11,736	11,706	1.00	D - 14
TOTAL	-----	-----	124,406	133,186	0.93	

TRAFFIC VOLUME AT THE SCREEN LINE OF CBD AREA (EAST-WEST SECTION)

(2)

SURVEY POINT N°	TRAFFIC VOLUME			MASTER PLAN STUDY (2)	COMPARISON (1) / (2)	PREVIOUS SURVEY POINT N°
	ENTRY	EXIT	TOTAL (1)			
12	---	3,032	3,032	3,753	0.81	D - 15
13	8,223	----	8,223	9,226	0.89	D - 16
14	----	9,629	9,629	10,347	0.93	D - 17
15	6,479	---	6,479	7,268	0.89	D - 18
16	----	9,468	9,468	10,190	0.93	D - 19
17	9,613	-----	9,613	7,936	1.21	D - 20
18	7,816	4,486	12,302	12,937	0.95	D - 21
19	-----	9,046	9,046	10,384	0.87	D - 22
20	9,914	----	9,914	8,815	1.12	D - 23
21	----	7,809	7,809	9,353	0.83	D - 25
22	14,009	---	14,009	13,623	1.03	D - 27
23	12,352	17,969	30,321	34,118	1.16	A - 4
TOTAL	----	----	139,359	137,930	1.01	

TRAFFIC VOLUME AT THE PERIPHERAL SCREEN LINE

(3)

Nº	Name of road	Traffic volume			Master Plan Study	Comparison
		Entry	Exit	Total		
23	Juñan Coronel	12,352	17,964	30,321	34,118	0.89
24	Av. Pedro Menéndez	28,768	27,715	56,483	47,455	1.19
25	Av. Delta	17,264	14,209	31,473	28,418	1.11
26	Puente 5 de Junio	16,606	17,521	34,127	38,569	0.88
27	Puente Portete	5,644	5,711	11,355	12,080	0.94
	TOTAL	—	—	163,759	160,640	1.02

Nº	Name of road	Traffic volume			Master Plan Study	Comparison
		Entry	Exit	Total		
28	Av. 25 de Julio	19,113	14,534	33,647	38,592	0.87
29	Rosa Borja de Icaza	—	12,889	—	12,935	1.00
30	Domingo Comín	13,450	—	—	12,745	1.06

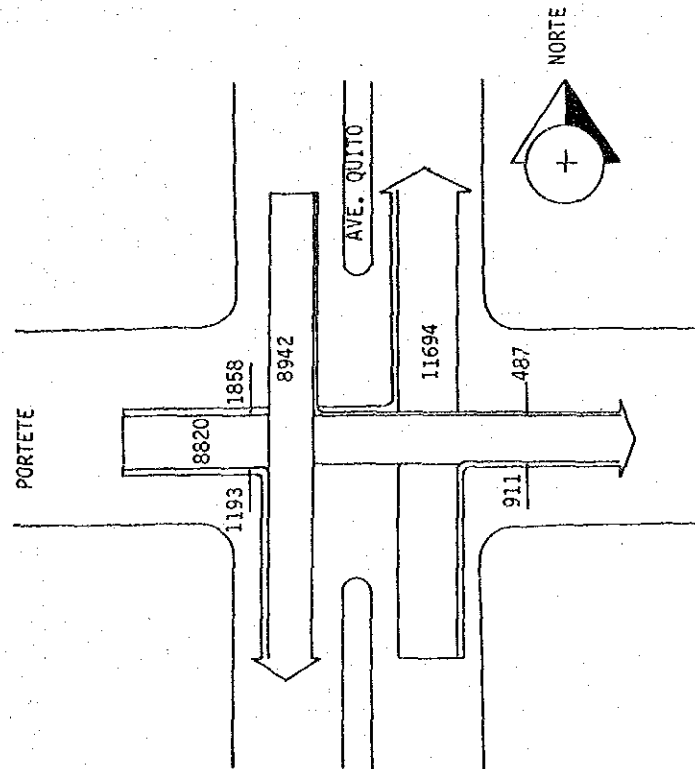
Note: Each figure shows traffic volume for all vehicles in 12 hrs.  
( 7:00~ 19:00 )



Appendix 1-2 RESULT OF THE INTERSECTION SURVEY

NOMBRE DE INTERSECCION: Avenida Quito y Portete .

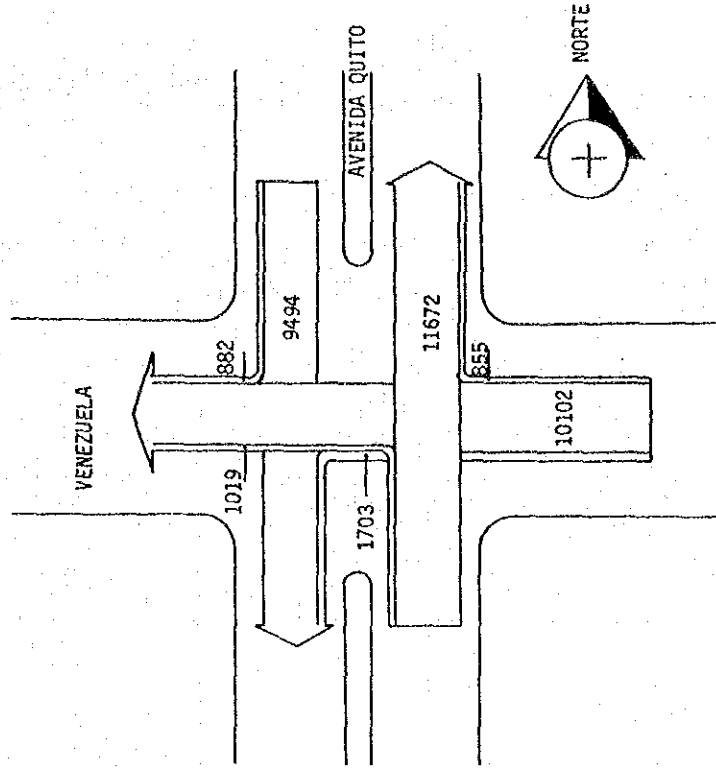
HORAS DE TRABAJO : 7:00 - 9:00 .



Survey hours: 7:00 ~ 19:00 Survey date: 18th Oct.

NOMBRE DE INTERSECCION - AVENIDA QUITO Y VENEZUELA

HORAS DE TRABAJO 7 : 00 - 19:00 .

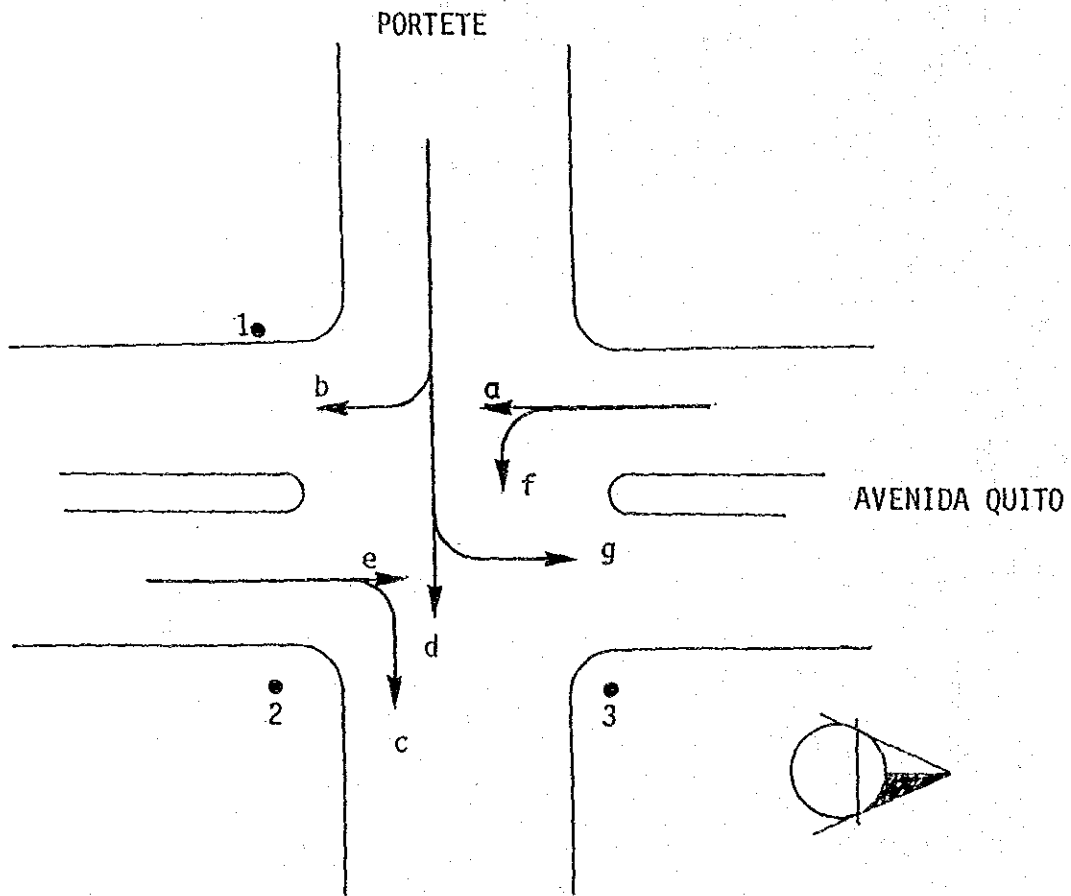


Result of the Intersection Survey

Name of Street: Av. Quito and Portete

Time : 7:00 - 19:00

Date : 18 Oct. 1985



TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction a							
07:00 - 08:00		259	268	51	234	812	32
08:00 - 09:00		241	234	39	217	731	32
09:00 - 10:00		226	239	39	117	621	36
10:00 - 11:00		241	274	22	170	707	42
11:00 - 12:00		269	258	47	169	743	45
12:00 - 13:00		325	310	39	159	833	70
13:00 - 14:00		277	292	38	178	785	43
14:00 - 15:00		249	245	28	154	676	36
15:00 - 16:00		218	240	41	168	667	42
16:00 - 17:00		260	264	9	186	719	37
17:00 - 18:00		314	245	24	197	780	67
18:00 - 19:00		330	322	27	189	868	70
TOTAL 12 HORAS		3209	3191	404	2138	8942	552
Direction b							
07:00 - 08:00		35	39	4	14	92	21
08:00 - 09:00		33	40	10	9	92	13
09:00 - 10:00		43	42	4	2	91	11
10:00 - 11:00		38	56	4	6	104	6
11:00 - 12:00		21	41	2	2	66	12
12:00 - 13:00		46	59	3	3	111	11
13:00 - 14:00		36	51	7	4	98	12
14:00 - 15:00		39	35	5	7	86	8
15:00 - 16:00		34	44	7	14	99	11
16:00 - 17:00		30	47	3	4	84	11
17:00 - 18:00		61	44	5	13	123	15
18:00 - 19:00		60	70	3	12	147	25
TOTAL 12 HORAS		478	568	57	90	1193	156

TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time \ Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction c						
07:00 - 08:00	27	19	1	7	54	9
08:00 - 09:00	26	34	3	2	65	10
09:00 - 10:00	35	44	4	3	86	14
10:00 - 11:00	32	37	6	4	79	8
11:00 - 12:00	33	24	4	2	63	8
12:00 - 13:00	44	25	3	3	75	10
13:00 - 14:00	35	22	5	4	66	4
14:00 - 15:00	29	38	6	4	77	13
15:00 - 16:00	34	25	4	4	67	10
16:00 - 17:00	36	35	5	2	78	7
17:00 - 18:00	43	42	-	8	93	9
18:00 - 19:00	49	41	3	15	108	7
TOTAL 12 HORAS	423	386	44	58	911	109
Direction d						
07:00 - 08:00	302	333	28	169	832	90
08:00 - 09:00	289	257	26	158	730	67
09:00 - 10:00	285	248	25	143	701	62
10:00 - 11:00	320	229	37	136	722	49
11:00 - 12:00	289	238	32	130	689	63
12:00 - 13:00	330	269	36	127	762	53
13:00 - 14:00	273	246	45	139	703	52
14:00 - 15:00	239	223	65	135	662	64
15:00 - 16:00	278	241	34	135	688	74
16:00 - 17:00	299	308	23	47	777	45
17:00 - 18:00	297	262	30	153	742	47
18:00 - 19:00	365	258	28	161	812	54
TOTAL 12 HORAS	3566	3112	409	1733	8820	720

TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction e							
07:00 - 08:00		334	344	32	299	1009	88
08:00 - 09:00		406	400	39	217	1062	99
09:00 - 10:00		400	338	79	164	981	64
10:00 - 11:00		381	319	105	163	968	52
11:00 - 12:00		360	284	107	168	918	66
12:00 - 13:00		373	284	66	159	882	50
13:00 - 14:00		319	280	59	197	855	52
14:00 - 15:00		362	349	107	168	986	68
15:00 - 16:00		380	352	91	190	1013	72
16:00 - 17:00		423	389	85	173	1070	62
17:00 - 18:00		366	315	88	195	964	63
18:00 - 19:00		392	296	55	197	940	58
TOTAL 12 HORAS		4496	3950	913	2290	11649	794
Direction f							
07:00 - 08:00		24	13	-	1	38	3
08:00 - 09:00		17	12	1	1	30	4
09:00 - 10:00		16	13	2	1	32	4
10:00 - 11:00		24	19	2	1	46	4
11:00 - 12:00		27	18	1	2	48	3
12:00 - 13:00		18	14	3	1	36	5
13:00 - 14:00		28	11	2	3	44	5
14:00 - 15:00		21	13	1	3	38	4
15:00 - 16:00		16	16	1	-	33	4
16:00 - 17:00		24	24	5	3	56	5
17:00 - 18:00		28	23	1	3	55	6
18:00 - 19:00		17	13	-	-	30	6
TOTAL 12 HORAS		260	189	19	19	487	50

TRAFFIC SURVEY OF INTERSECTIONS

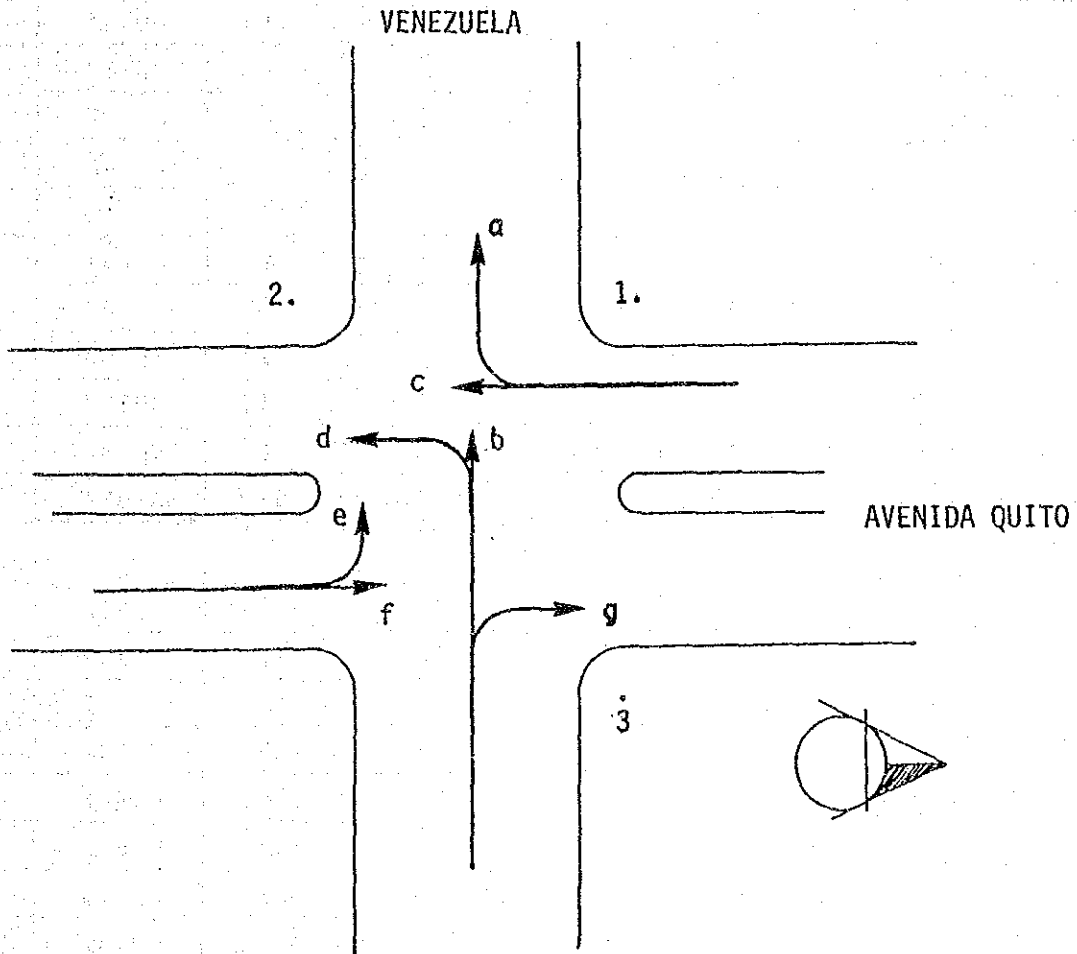
Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction g							
07:00 - 08:00		39	46	10	43	138	21
08:00 - 09:00		50	49	5	36	140	28
09:00 - 10:00		58	65	7	30	160	19
10:00 - 11:00		58	65	10	28	161	17
11:00 - 12:00		54	56	7	28	145	13
12:00 - 13:00		55	60	8	37	160	9
13:00 - 14:00		65	46	11	35	157	8
14:00 - 15:00		55	56	17	34	162	15
15:00 - 16:00		56	70	7	37	170	11
16:00 - 17:00		51	36	7	33	127	13
17:00 - 18:00		54	64	2	39	159	29
18:00 - 19:00		65	81	5	28	179	11
TOTAL 12 HORAS		669	694	96	408	1858	194

Intersection Survey

Name of Street : Avenida Quito and Venezuela

Date : 18 Oct. 1985



TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction a							
07:00 - 08:00		22	31	2	4	59	3
08:00 - 09:00		29	24	1	7	61	4
09:00 - 10:00		30	22	-	3	55	5
10:00 - 11:00		33	30	2	2	67	6
11:00 - 12:00		40	30	4	4	78	6
12:00 - 13:00		19	27	3	-	49	17
13:00 - 14:00		24	42	-	12	78	8
14:00 - 15:00		24	25	4	4	57	4
15:00 - 16:00		46	30	3	10	89	7
16:00 - 17:00		19	35	1	5	60	5
17:00 - 18:00		62	56	11	8	137	10
18:00 - 19:00		40	46	2	4	92	10
TOTAL 12 HORAS		388	398	33	63	882	85
Direction b							
07:00 - 08:00		267	285	22	217	791	28
08:00 - 09:00		228	280	50	167	725	25
09:00 - 10:00		247	285	37	162	731	33
10:00 - 11:00		265	288	46	135	734	46
11:00 - 12:00		313	297	32	184	826	58
12:00 - 13:00		333	354	56	147	890	58
13:00 - 14:00		391	339	30	315	1075	45
14:00 - 15:00		258	198	32	141	629	34
15:00 - 16:00		284	273	32	186	775	39
16:00 - 17:00		316	331	30	147	824	65
17:00 - 18:00		448	437	25	230	1140	68
18:00 - 19:00		393	437	31	162	962	81
TOTAL 12 HORAS		3743	3743	423	2193	10102	580



TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction c							
07:00 - 08:00		273	319	43	225	860	54
08:00 - 09:00		250	241	61	225	777	38
09:00 - 10:00		298	261	41	105	765	42
10:00 - 11:00		265	274	42	172	753	43
11:00 - 12:00		251	289	45	157	742	48
12:00 - 13:00		350	324	38	159	871	70
13:00 - 14:00		320	297	54	178	849	44
14:00 - 15:00		271	229	41	152	693	39
15:00 - 16:00		231	277	50	160	718	41
16:00 - 17:00		274	248	32	182	736	43
17:00 - 18:00		339	249	31	189	808	64
18:00 - 19:00		374	315	39	194	922	88
TOTAL 12 HORAS		3496	3323	517	2158	9494	614
Direction d							
07:00 - 08:00		62	62	3	23	150	4
08:00 - 09:00		50	47	6	20	123	3
09:00 - 10:00		64	53	10	19	146	12
10:00 - 11:00		61	36	1	17	115	12
11:00 - 12:00		60	54	3	17	134	17
12:00 - 13:00		79	69	7	16	171	15
13:00 - 14:00		94	50	7	24	175	15
14:00 - 15:00		49	36	2	20	107	12
15:00 - 16:00		38	50	5	15	108	5
16:00 - 17:00		45	44	5	18	112	14
17:00 - 18:00		86	72	2	17	177	15
18:00 - 19:00		93	72	3	17	185	12
TOTAL 12 HORAS		781	645	54	223	1703	136

TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction e							
07:00 - 08:00		19	21	6	12	58	8
08:00 - 09:00		31	33	3	8	75	11
09:00 - 10:00		27	38	7	4	76	7
10:00 - 11:00		21	41	13	2	77	12
11:00 - 12:00		42	32	6	6	86	9
12:00 - 13:00		30	51	6	2	89	16
13:00 - 14:00		36	46	9	5	96	11
14:00 - 15:00		37	35	8	2	82	6
15:00 - 16:00		29	37	7	8	81	13
16:00 - 17:00		27	42	8	6	83	17
17:00 - 18:00		60	66	10	7	143	5
18:00 - 19:00		26	43	2	2	73	13
TOTAL 12 HORAS		385	485	85	64	1019	128
Direction f							
07:00 - 08:00		362	335	39	288	1024	87
08:00 - 09:00		399	373	48	216	1036	104
09:00 - 10:00		415	312	73	123	923	73
10:00 - 11:00		345	329	83	125	882	64
11:00 - 12:00		336	262	99	149	846	61
12:00 - 13:00		366	282	60	171	879	57
13:00 - 14:00		341	284	66	183	874	50
14:00 - 15:00		358	331	96	162	947	67
15:00 - 16:00		405	331	97	166	999	71
16:00 - 17:00		454	387	96	198	1135	66
17:00 - 18:00		426	361	88	177	1052	60
18:00 - 19:00		392	301	45	337	1075	70
TOTAL 12 HORAS		4599	3888	890	2295	11672	830

TRAFFIC SURVEY OF INTERSECTIONS

Date: 18 Oct. 1985

Time	Type of Vehicle	Passenger Car, Jeep Taxi	Light Lorry	Lorry	Bus	Total	Motor Cycle
Direction g							
07:00 - 08:00		21	21	4	4	50	-
08:00 - 09:00		37	27	7	-	71	3
09:00 - 10:00		52	42	13	1	108	2
10:00 - 11:00		23	26	15	2	72	2
11:00 - 12:00		47	30	9	1	87	1
12:00 - 13:00		28	19	4	2	53	6
13:00 - 14:00		37	25	4	-	66	2
14:00 - 15:00		30	21	6	-	57	8
15:00 - 16:00		34	37	6	-	77	6
16:00 - 17:00		34	26	7	-	67	5
17:00 - 18:00		30	30	7	2	69	7
18:00 - 19:00		43	29	4	2	78	1
TOTAL 12 HORAS		422	333	86	14	855	43

Appendix 1-3 ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

Nº	ROUTE NAME	Nº OF VEHICLES	SPECIAL	ORDINARY	Nº OF ROUND TRIPS		GROUP	COLECTIVO AND MICROBUS	
					SPECIAL	ORDINARY		COOPERATIVA NAME	ROUTE CHANGE
1	1	43	16	27	SPECIAL 53	2	AHORRO Y CREDITO GUAYAQUIL LTDA.	WITH 3	
2	2 CORRIENTE	22		22	ORDINARY 105	1	AHORRO Y CREDITO LTDA.		
3		35	35		271	1	AHORRO Y CREDITO		
4	3	46	12	34	73	3	LIMITADA	WITH 1	
5	4	38	6	32	160	6	RIO GUAYAS LTDA.		
6	5	40	20	20	224	12	LA NUEVA UNION	WITH 10	
7	6	46	16	30	SPECIAL 78 ORDINARY 88	4	GRAN COLOMBIA LTDA	WITH 12	
8	7	46	25	21	254	7	LIBERTADOR BOLIVAR		
9	8	48	22	26	163	15	SANTIAGO DE GUAYAQUIL	WITH 15	
10	9	46	30	16	158	9	NUEVA UNION LIMITA DA		
11	10	45	10	35	110	10	10 DE AGOSTO LTDA	WITH 5	
12	11	46	24	22	297	11	LIMITADA		
13	12	33	18	15	SPECIAL 76 ORDINARY 67	5	RIO AMAZONAS LTDA.		
14	13	46	20	26	SPECIAL 93 ORDINARY 74	10	10 DE AGOSTO LTDA.		
15	14	51	16	35	SPECIAL 86 ORDINARY 101	14	ATAHUALPA		
16	15	46	25	21	SPECIAL 131 ORDINARY 40	8	J. JOAQUIN DE OLMEDO	WITH 8	

ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

COLECTIVO AND MICROBUS

NO	ROUTE NAME	NO OF VEHICLES	SPECIAL	ORDINARY	NO OF ROUND TRIPS		GROUP	COOPERATIVA NAME
					SPECIAL	ORDINARY		
17	16	52	10	42	SPECIAL 60	16	RAFAEL MORAN V. DE TRANSPORTE	
18	17	29	29		82	17	PRESIDENTE ELOY ALFARO. - DURAN	
19	17A							
20	18	47	47		154	20	16 DE OCTUBRE LTDA DURAN	
21	19	69	39	30	95	22	TRANS GUAYAS	
22	20	35			199	30	UNIDOS VENCEREMOS	
23	21	30	15	15	132	18	CONDOR LIMITADA	
24	22	18		18	67	26		
25	24	22	9	13	SPECIAL 68 ORDINARY 90	24	DE TRANSPORTE 10 DE MARZO	
26	25	30		30	77	30		
27	26	16		16	74	8	ROSE JOAQUIN DE OLMEDO STGO DE EQUIL	
28	27	32	16	16	219	21	TRANS-GUAYAS	
29	28	40	15	25	153	28		
30	29	13		13	64	27	CESAR AUGUSTO SANDINO	
31	30	12		12	75	29	GUAYAQUIL DE MIS AMORES	
32	31	40		40	132	23	REINA DEL GUASMO	

ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

BUS

NO	ROUTE NAME	NO OF VEHICLES	SPECIAL	ORDINARY	NO OF ROUND TRIPS	GROUP	COOPERATIVA NAME
33	32	31	16	15	220	1	TARQUI
34	33	31	12	19	180	2	PERLA DEL PACIFICO
35	34	33	7	16	135	3	ELOY ALFARO
36	35	31	5	26	106	4	
37	36	28	3	25	120	5	
38	37	23	2	21	140	6	LUZ DEL GUAYAS
39	38	18		18	37	7	GUAYAQUIL
40	39	16		16	274	8	

ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

BUSETA

NO	ROUTE NAME	NO OF VEHICLES	NO OF ROUND TRIP	GROUP	COOPERATIVA NAME	ROUTE CHANGE
41	40	30	274	3	LIMITADA	
42	41	25	379	3	LIMITADA	
43	42	40	250		LAS CAMBERRAS	WITH 43
44	43	25	114			WITH 42
45	44	40	305	5		
46	45	20	255	4	GRAN COLOMBIA	
47	46	22	333	8	JOSE JOAQUIN DE OLMEDO	
48	47	31	173		ALBOSAV Y ANEXOS	
49	48	35	110	2	CIUDADELAS UNIDAS	
50	49		130	1		
51	50	20	288	4	GRAN COLOMBIA	
52	51	14	114	5	SAUCES 5	WITH 55 and 56
53	52	23	303		POLICENTRO	
54	53	18	165	5	RIO AMAZONAS	
55	54	20	193			
56	55	14	140	5	MARTHA DE ROLDOS FLORESTA	WITH 51
57	56	12	24			
58	57	39	170	1		

ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

BUSETA

NO	ROUTE NAME	Nº OF VEHICLES	Nº OF ROUND TRIPS	GROUP	COOPERATIVA NAME
60	59	43	196	2	
61	60	13	183	5	RIO AMAZONAS
62	61	28	319	61	
63	62	25	186		24 DE ABRIL
64	63	17	111	25	COMPANIA OTEPSA
65	64	15	132	26	PRE-COOPERATIVA 2 DE ENERO
66	65	10	60		PRE-COOPERATIVA ALBAN BORJA
67	65/#2				
68	66	14	313	8	EL EJECUTIVO

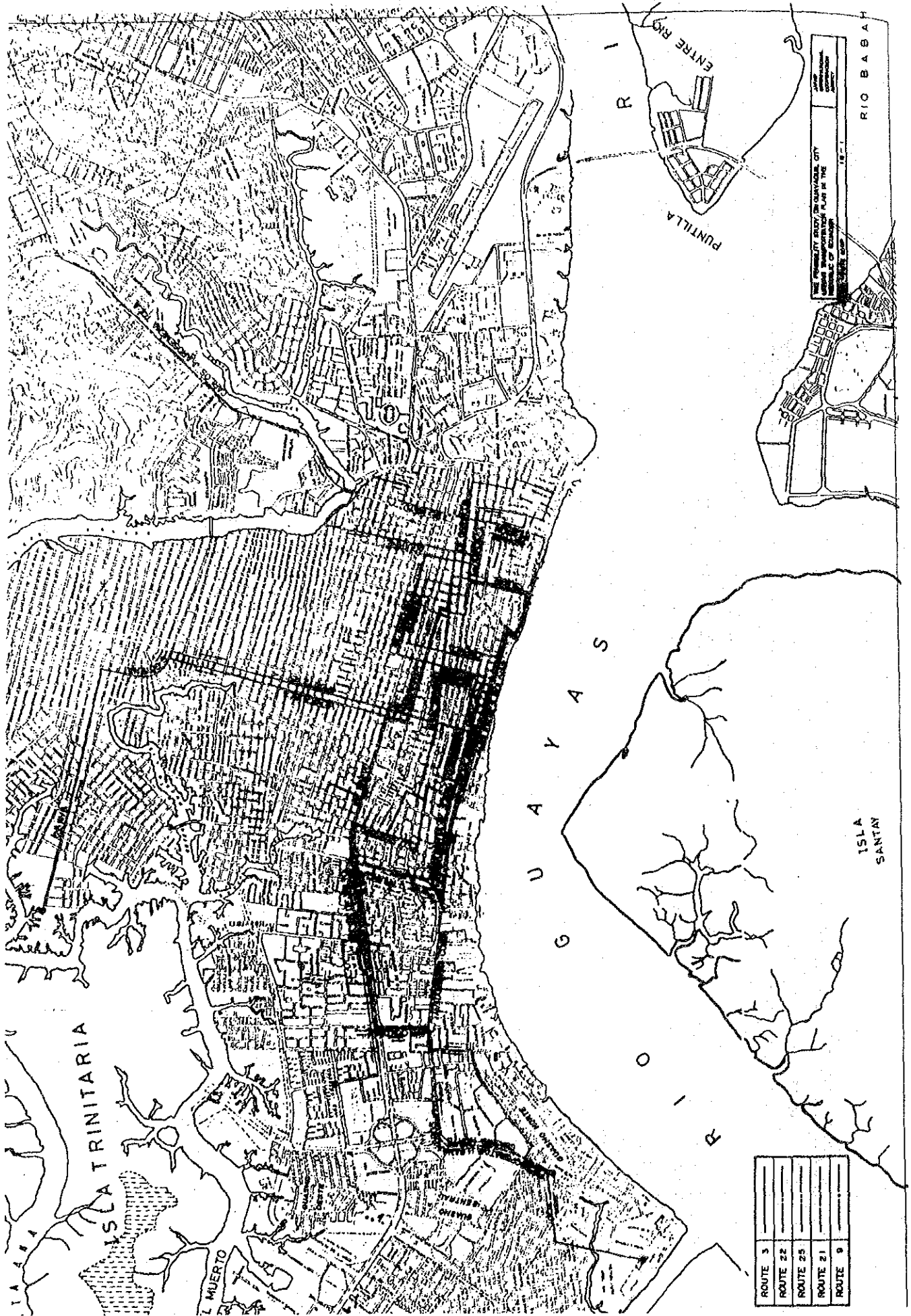


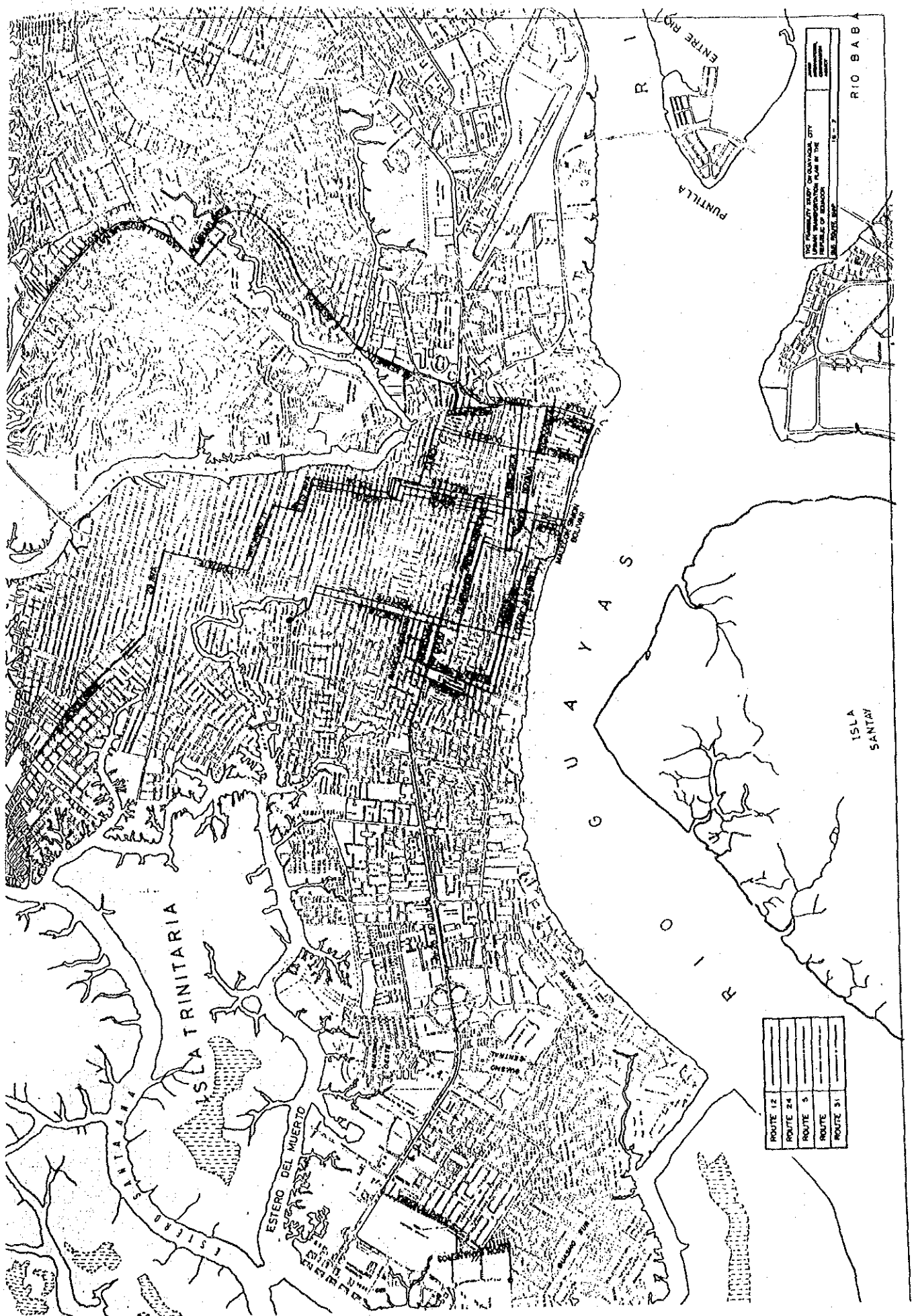
ACTUAL CONDITIONS OF THE URBAN BUS SYSTEM

TO/FROM THE TERMINAL TERRESTRE

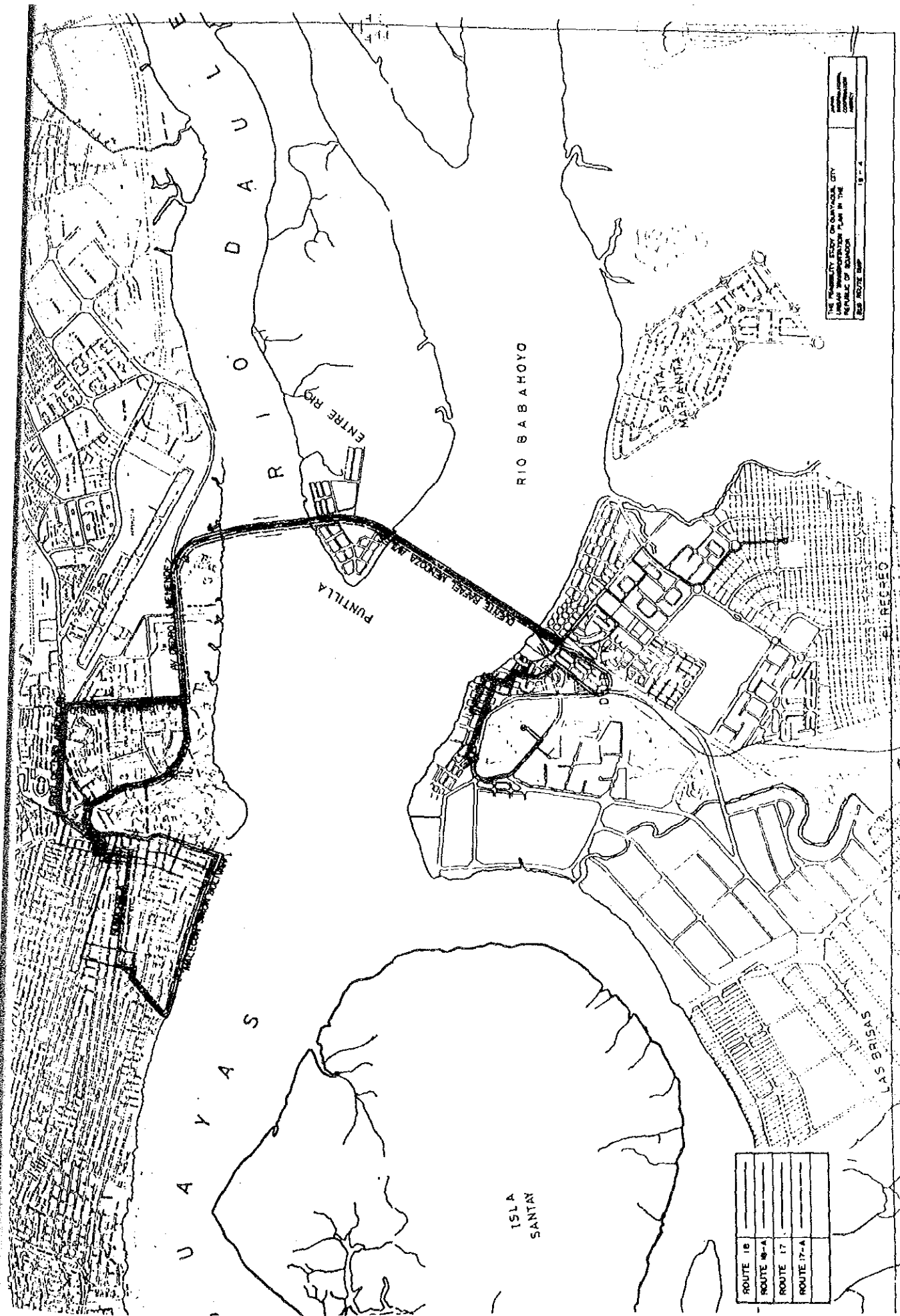
Nº	ROUTE NAME	Nº OF VEHICLES	GROUP	COOPERATIVA NAME
69	69	10	3	AHORRO Y CREDITO LIMITADA
		6	11	LTDA.
		4		3 DE JULIO
70	70	18		DE AHORRO Y CREDITO CDTE, RAFAEL MORAN
71	71		8	JOSE JOAQUIN DE OLMEDO
72	72	10		AHORRO Y CREDITO CIUDAD DE GUAYAQUIL
73	73	7		AHORRO Y CREDITO 10 DE AGOSTO
		7	12	NUEVA UNION
74	74	19		UNIODOS VENCEREMOS LTDA.
75	75			TRANSPORTES ALBAN BORJA
76	76		31	REINA DEL GUASMO
77	77	12	7	
78		13		TRANSPORTES HERMANO MIGUEL

Appendix 1-4 BUS ROUTE MAP









THE PROJECT IS A STUDY OF THE ROAD NETWORK IN THE  
 URBAN SUBDIVISION PLAN IN THE  
 REPUBLIC OF BOLIVIA  
 1974

ROUTE 16	
ROUTE 16-A	
ROUTE 17	
ROUTE 17-A	



