TABLES

Table 1 HISTORICAL TREND OF IRRIGATION AREA IN PENINSULAR MALAYSIA

Unit: 10^3 ha

Year	Irrigation Area Main	Irrigation Area Off	% of Double Cropping Area	Remarks
1932	30.6	0	0	DID was established.
1933	33.0	0	0	
1934	34.9	0	0	
1935	38.0	0	0	
1936	52.8	0	0	
1937	58.4	0	0	
1938	63.3	0	0	
1939	70.6	0	0	
1940	72.9	0	0	
1941-1945	-	-	-	Japanese occupation
1946	80.4	0	0	
1947	122.6	0.6	0.5	
1948	132.7	1.1	0.9	
1949	133.4	2.0	1.5	
1950	141.0	2.6	1.9	
1951	145.6	2.1	1.4	
1952	146.7	1.0	0.7	
1953	148.9	1.6	1.1	
1954	178.6	3.5	1.9	
1955	191.4	1.6	0.8	
1956	192.4	3.5	1.8	
1957	204.8	2.8	1.4	Independence of Malaya
1958	210.8	3.0	1.4	
1959	211.5	4.1	1.9	
1960	213.8	8.0	3.8	
1961	220.0	12.1	5.5	
1962	221.2	15.6	7.1	
1963	224.7	16.8	7.5	
1964	226.2	18.4	8.1	
1965	226.9	28.6	12.6	
1966	228.8	32.4	14.1	
1967	238.2	52.8	22.2	
1968	241.7	72.5	30.0	
1969	244.3	75.3	30.8	
1970	248.3	118.4	47.7	
1971	251.3	145.0	57.7	
1972	277.6	175.8	63.3	
1973	280.4	196.7	70.1	The Muda and Kemubu Projects were completed.
1974	283.4	206.0	72.7	
1975	288.0	216.9	75.3	
1976	289.7	223.3	77.1	
1977	292.4	227.7	77.9	
1978	293.2	230.4	78.6	
1979	299.4	230.2	76.9	

Source; DID (Ref. 24)

Table 2 HISTORICAL TREND OF IRRIGATION AREA BY STATE IN PENINSULAR MALAYSIA (1970 - 1979)

Unit: 10^3 ha

	1970		1971		1972		1973		1974	
	Main	Off	Main	Off	Main	Off	Main	Off	Main	Off
Perlis	2.9	-	2.9	-	3.8	-	4.3	-	4.3	-
Kedah	9.4	3.3	10.1	3.9	10.4	4.6	10.9	5.0	11.2	5.3
P. Pinang	14.8	13.6	10.9	13.9	15.0	14.0	15.3	14.2	15.2	14.2
Perak	47.6	31.4	47.9	31.7	48.0	32.0	48.1	33.0	49.4	36.0
Selangor	21.3	20.8	21.3	20.8	21.4	20.8	20.1	19.8	20.2	19.8
N. Sembilan	9.3	5.0	9.4	5.0	9.5	5.2	9.7	5.3	10.0	5.5
Melaka	8.2	1.9	8.2	1.9	8.4	2.1	8.6	2.5	8.8	2.7
Johor	4.7	3.2	4.7	3.2	4.7	3.2	4.5	3.2	4.5	3.2
Pahang	15.2	0.9	16.0	1.3	17.1	1.5	17.5	1.5	18.3	1.7
Trengganu	11.0	4.7	11.3	4.7	11.5	4.7	11.6	4.7	11.7	4.7
Kelantan	18.1	-	15.6	-	15.7	6.8	14.9	6.7	14.9	8.1
MADA	80.9	33.6	80.9	46.5	95.9	68.8	95.9	86.6	95.9	88.6
KADA	4.9	-	12.1	12.1	16.2	12.1	19.0	14.2	19.0	16.2
Total	248.3	118.4	251.3	145.0	277.6	175.8	280.4	196.7	283.4	206.0

	1975		1976		1977		1978		1979	
	Main	Off	Main	Off	Main	Off	Main	Off	Main	Off
Perlis	4.7	-	4.7	-	4.7	-	4.7	-	4.7	-
Kedah	11.7	5.5	11.9	5.8	12.5	6.4	12.8	6.6	12.8	6.6
P. Pinang	16.8	14.2	16.8	12.8	16.8	14.6	16.8	15.7	16.8	15.7
Perak	49.8	44.6	49.5	49.2	49.7	49.4	48.7	48.3	48.6	48.2
Selangor	20.1	19.9	20.4	20.2	20.4	20.2	20.4	20.2	19.8	19.2
N. Sembilan	10.3	5.9	10.6	6.0	10.7	7.2	11.2	7.4	11.5	7.5
Melaka	8.9	2.7	8.9	2.7	8.9	2.7	9.0	2.7	9.0	2.7
Johor	4.5	3.2	4.7	3.4	4.7	3.4	4.8	3.5	3.7	3.6
Pahang	18.6	1.7	18.8	1.8	19.1	1.8	19.2	1.9	19.3	1.9
Trengganu	12.8	5.5	13.6	7.3	15.1	7.9	15.8	9.9	16.3	10.3
Kelantan	14.9	8.1	2.1	0.1	2.1	0.1	2.1	0.2	9.2	0.5
MADA	95.9	88.6	95.9	88.6	95.9	88.6	95.9	88.6	95.9	88.6
KADA	19.0	17.0	31.8	25.4	31.8	25.4	31.8	25.4	31.8	25.4
Total	288.0	216.9	289.7	223.3	292.4	227.7	293.2	230.4	299.4	230.2

Source; DID (Ref. 25)

Table 3 CLASSIFICATION OF EXISTING IRRIGATION SCHEMES BY AREA IN 1979

State	Smaller than 50 ha		51 - 100 ha		101 - 500 ha		501 - 1,000 ha	
	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.
Perlis	190	6	243	3	2,651	9	1,618	2
Kedah	447	13	1,078	13	4,828	21	2,710	3
P. Pinang	38	2	64	1	901	5	1,915	3
Perak	626	19	850	12	3,833	23	2,491	3
Selangor	207	8	509	7	190	1	-	-
N. Sembilan	2,363	82	2,726	37	5,281	27	1,093	2
Melaka	609	21	654	9	4,065	16	2,498	4
Johor	247	7	87	1	2,554	12	846	1
Pahang	4,183	161	3,784	52	9,423	58	546	1
Trengganu	201	8	1,169	16	2,202	12	618	1
Kelantan	970	32	1,136	16	4,404	19	2,772	4
Total	10,081	359	12,300	167	40,332	203	17,107	24

State	1,001 - 5,000 ha		5,001 - 10,000 ha		Larger than 10,000 ha		Total	
	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.
Perlis	-	-	-	-	-	-	4,702	20
Kedah	3,764	3	-	-	95,912	1	108,739	54
P. Pinang	6,722	3	7,115	1	-	-	16,755	15
Perak	11,778	5	6,555	1	22,470	1	48,603	64
Selangor	-	-	-	-	18,942	1	19,848	17
N. Sembilan	-	-	-	-	-	-	11,463	148
Melaka	1,133	1	-	-	-	-	8,959	51
Johor	-	-	-	-	-	-	3,734	21
Pahang	1,366	1	-	-	-	-	19,302	273
Trengganu	12,085	5	-	-	-	-	16,275	42
Kelantan	2,088	1	11,636	1	17,994	1	41,000	74
Total	38,936	19	25,306	3	155,318	4	299,380	779

Remarks; The Muda Irrigation Project of 95,912 ha is incorporated into the State of Kedah.

Source; DID (Ref. 6)

Table 4 PRINCIPAL FEATURES OF THE EXISTING MAJOR PROJECTS

Item	Unit	Muda	Krian	Sungei Manik	Tanjong Karang	Besut	Kemubu	North Kelantan
1. Irrigation Area								
- Main season	ha	95,860	23,490	6,555	19,263	5,058	17,994	11,636
- Off season	ha	91,580	21,142	5,900	19,263	4,047	16,992	11,636
2. Type of Scheme		Reservoir & Gravity	Reservoir & Pumping	Gravity & Pumping	Gravity & Pumping	Gravity	Pumping	Gravity & Pumping
3. Water Source		Muda & Pedu reservoirs & Pedu river	Bt. Merah reservoir & Kerian river	Batang Padang river	Bernam & Tingi rivers	Besut river	Kelantan river	Lemal & Kelantan rivers
4. Year Completed		1973	1906	1939	1964	1976	1973	1968-1970
5. Existing Facilities								
- Reservoir	nos.	2	1	-	-	-	-	-
- Headworks	nos.	1	-	1	2	2	1	1
- Pumping station (Main)	nos.	-	1	1	1	-	-	3
- Main irrigation canal	km	98	92	3	82	29	68	12
- Secondary irri. canal	km	965	432	47	117	77	-	121
- Tertiary canal	km	-	-	132	-	86	410	-
- Distribution canal	km	-	-	-	-	22	-	-
- Drainage canals	km	886	537	203	177	73	350	-
- Farm roads	km	771	N.A	N.A	160	42	N.A	N.A
- Bunds	km	-	115	-	-	-	12	133
Canal density	m/ha	10.1	18.4	27.3	10.3	36.6	22.8	10.4

Table 5 CLASSIFICATION OF EXISTING IRRIGATION SCHEMES BY TYPE IN 1979

State	G		G+P		P	
	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.
Perlis	4,702	20	-	-	-	-
Kedah	100,134	37	808	1	4,160	9
P. Pinang	5,204	7	789	1	10,762	7
Perak	12,668	50	30,840	5	4,893	8
Selangor	906	16	18,942	1	-	-
N. Sembilan	11,463	148	-	-	-	-
Melaka	5,447	43	2,877	4	401	2
Johor	3,274	14	-	-	460	7
Pahang	2,971	69	2,072	6	3,442	32
Trengganu	6,818	17	-	-	6,424	17
Kelantan	2,726	24	5,314	34	32,960	16
Total	156,313	445	61,642	52	63,502	98

State	C		I		Total	
	Area (ha)	Nos.	Area (ha)	Nos.	Area (ha)	Nos.
Perlis	-	-	-	-	4,702	20
Kedah	3,637	7	-	-	108,739	54
P. Pinang	-	-	-	-	16,755	15
Perak	202	1	-	-	48,603	64
Selangor	-	-	-	-	19,848	17
N. Sembilan	-	-	-	-	11,463	148
Melaka	234	2	-	-	8,959	51
Johor	-	-	-	-	3,734	21
Pahang	8,594	117	2,223	49	19,302	273
Trengganu	3,033	8	-	-	16,275	42
Kelantan	-	-	-	-	41,000	74
Total	15,700	135	2,223	49	299,380	779

Remarks; G = Gravity, P = Pumping, C = Control Drainage, I = Inundation

The Muda Irrigation Project of 95,912 ha is incorporated into the State of Kedah.

Source; DID (Ref. 6)

Table 6 COMPARISON OF IRRIGATION WATER DEMAND CALCULATION (1/4)

Item	Unit	Recommended Figure				
		S. Matsushima (1962)/1	Van de Goor & Zijlstra (1963)/2	Van de Goor & Zijlstra (1968)/3	K. Sugimoto (1971)/4	DID Manual (1973)/5
1. Irrigation Schedule:						
- Presaturation period	days		40	40-50	25	40
- Normal irrigation						
Main season	days		100	100	107	
Off season	days		100	100	117	
2. Presaturation Requirement:						
- Main season	mm	457	432*	457*	278	440
- Off season	mm	457	508*	514*	398	508
3. Consumptive Use:						
- Main season	mm	648	762*	762*	591	Main season 229 mm/month*
- Off season	mm	648	762*	826*	829	
4. Percolation Loss:						
- Rate	mm/d		0	0	1.0	Off season 254 mm/month*
- Main season	mm		0	0	107	
- Off season	mm		0	0	117	
5. Total Requirement: (3+4+5)						
- Main season	mm	1,105	1,194*	1,219*	976	
- Off season	mm	1,105	1,270*	1,340*	1,344	

Remarks; *: Including distribution loss

Source; /1: Ref. 12, /2: Ref. 13, /3: Ref. 26, /4: Ref. 14, /5: Ref. 27

Table 7 COMPARISON OF IRRIGATION WATER DEMAND CALCULATION (2/4)

Item	Unit	World Bank Appraisal Report					
		Muda II (1979)	Krain (1978)	Sungei Manik (1978)	Tanjong Karang (1978)	North Kelantan (1976)	Kemubu (1967)
1. Net Irrigation Area:	ha	95,832	24,005	6,554	19,848	12,000	19,000
2. Irrigation Schedule:							
- Presaturation period	days	35	30	30	30	30	30
- Normal irrigation							
Main season	days	115	120	120	120	120	92
Off season	days	128	120	120	120	120	92
3. Presaturation Requirement:*							
- Main season	mm	302	421	451	379	315	229
- Off season	mm	426	415	451	408	335	305
4. Consumptive Use:							
- Main season	mm	489	604	641	525	650	610
- Off season	mm	642	643	676	629	700	610
5. Percolation Loss:							
- Rate	mm/d	1.3	1.8	3.3	1.8	0.8	
- Main season	mm	127	213	397	213	100	
- Off season	mm	144	213	397	213	100	
6. Total Requirement: (3+4+5)							
- Main season	mm	918	1,239	1,489	1,117	1,065	839
- Off season	mm	1,212	1,270	1,524	1,250	1,135	915
7. Effective Rainfall: (Calculation Method)		Daily Balance: $R \leq 5$: Re=0; $5 < R \leq 40$: Re=R; $R > 40$: Re=40	60% of monthly rainfall	60% of monthly rainfall	30% of monthly rainfall	Daily Balance: 1st month = Max. 50mm; Succeeding month = Max.150mm	Up to crop requirement
8. Irrigation Efficiency:	%	80**	70	60	60	52	88**

Remarks; *: Including replenishment for evaporation loss during presaturation period
**: Conveyance efficiency

Table 8 COMPARISON OF IRRIGATION WATER DEMAND CALCULATION (3/4)

Item	Unit	Study by Consultants			
		Rompin-Endau (1979)/1	Kemasin-Semerak (1979)/2	Trengganu River Basin Study(1977)/3	Kuantan Region Study (1977)/4
1. Net Irrigation Area:	ha	14,653	8,900	6,390	971
2. Irrigation Schedule:					
- Presaturation period	days		30	35	15
- Normal irrigation					
Main season	days	135	104	107	115
Off season	days	107	72	119	100
3. Presaturation Requirement:					
- Main season	mm	210	295	150	477*
- Off season	mm	210	295	150	478*
4. Consumptive Use:					
- Main season	mm	703	585	755	435
- Off season	mm	502	595	751	458
5. Percolation Loss:					
- Rate	mm/d	2	2.5	3.0	1.5
- Main season	mm	270	260	322	173
- Off season	mm	214	180	358	150
6. Total Requirement:					
- Main season	mm	1,183	1,140	1,227	1,085
- Off season	mm	926	1,070	1,259	1,086
7. Effective Rainfall:		76% to 45% of 10-day rainfall	80% of 5-year drought rainfall	60% of average monthly rainfall	
8. Irrigation Efficiency:	%	60	64	68	65

Remarks; *: Including replenishment for evaporation loss during presaturation period

Source; /1: Ref. 28, /2: Ref. 29, /3: Ref. 30, /4: Ref. 31

Table 9 COMPARISON OF IRRIGATION WATER DEMAND CALCULATION (4/4)

Item	Unit	Muda Irrigation Scheme				
		Muda River Project (1963)/1	Feasibility Report by MADA (1977)/2	Muda II Appraisal Report (1979)/3	Kedah-Perlis Development Study (1978)/4	Kedah-Perlis W.R.M.S. (1980)/5
1. Irrigation Schedule						
- Presaturation period						
Main season	days	40	37	35	21-30	20
Off season	days	40	46	35	21-30	20
- Normal irrigation						
Main season	days	144	90	115	113	83
Off season	days	82	95	128	93	88
2. Presaturation Requirement						
- Main season	mm	440*	273**	302	380	455
- Off season	mm	508*	578**	426	388	575
3. Consumptive Use & Percolation						
- Main season	mm	1,094*	564**	616	565	439
- Off season	mm	697*	800**	786	512	607
4. Total Requirement						
- Main season	mm	1,534*	837**	918	945	894
- Off season	mm	1,205*	1,378**	1,212	900	1,182
5. Irrigation Efficiency	%	-	77	80	74-77	80
6. Effective Rainfall (Calculation Method)			Daily Balance: $R \leq 5$: $Re=0$; $5 < R \leq 40$: $Re=R$; $R > 40$: $Re=40$	Daily Balance: $R \leq 5$: $Re=0$; $5 < R \leq 40$: $Re=R$; $R > 40$: $Re=40$		

Remarks; *: Including field and conveyance losses
**: Including field loss

Source; /1: Ref. 32, /2: Ref. 7, /3: Ref. 3, /4: Ref. 33, /5: 34

Table 10 ZONING FOR CALCULATION OF IRRIGATION WATER DEMAND

Zone No.	Basin No.	Rainfall Station		Evaporation Station		Major Irrigation Scheme
		Name	No.	Name	No.	
P 1	1 - 7	Kepala Batas	6204039	Simpang Tiga	5904352	Muda
P 2	8 & 9	Selinsing	4906022	Bukit Merah	5006321	Kerian
P 3	10	Telok Anson	4010098	Telok Anson	402	Sg. Manik and Trans Perak Stage IV
P 4	11 - 15	Pasir Panjang	3510015	Sungai Besar	3609313	Tanjong Karang
P 5	16 - 23	Tebong	2423001	Tampin	219	-
P 6	24 - 29	Paya Sepayang	2734183	Mersing	230	Rompin-Endau and Sewah-Endau
P 7	30 - 34	Paya Kangsar	3924072	Sungai Tekam	363	Trans Pahang
P 8	35 - 41	Kota Bharu	6122064	Kota Bharu	670	Kemubu, Lemal, Kemasin Semerak and Besut

Table 11 AVERAGE MONTHLY RAINFALL AND EVAPORATION

Unit: mm

Station	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
Rainfall/1													
1. Kepala Batas	44	52	103	188	238	189	191	217	312	311	208	95	2148
2. Selinsing	136	171	231	303	191	118	148	149	204	383	298	266	2598
3. Telok Anson	159	166	215	243	151	112	104	115	198	298	314	254	2329
4. Pasir Panjang	143	112	108	144	121	97	90	122	138	213	267	188	1743
5. Tebong	77	89	145	186	151	117	128	133	144	188	185	164	1709
6. Paya Sepayang	361	279	182	147	180	194	189	219	198	241	430	844	3463
7. Paya Kangsar	122	121	126	172	180	136	127	173	186	250	277	276	2146
8. Kota Bharu	209	63	94	88	108	146	162	190	210	312	659	675	2817
Evaporation (Open Water Evaporation)/2													
1. Simpang Tiga	162	171	186	168	155	136	156	149	141	134	127	134	1819
2. Bukit Merah	161	158	169	154	154	157	161	161	141	147	135	141	1839
3. Telok Anson	157	149	177	161	162	157	161	170	166	165	146	141	1912
4. Sungai Besar	145	148	166	156	153	151	153	157	142	147	135	130	1783
5. Tampin	153	152	173	156	152	140	144	150	154	156	142	138	1810
6. Mersing	149	151	172	166	153	143	139	144	149	145	129	121	1761
7. Sungai Tekam	154	137	168	170	167	156	165	168	165	158	137	144	1889
8. Kota Bharu	144	148	177	185	167	155	155	157	158	143	122	119	1830

Remarks; /1: Average for 20 years from 1960 to 1979
/2: Ref. 23

Table 12 MONTHLY RAINFALL IN ZONE P 1

Station: Kepala Batas (No. 6204039) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	32	12	201	165	263	242	298	239	432	135	200	32	2251
1961	67	75	110	183	187	223	114	115	352	331	122	216	2095
1962	10	1	131	183	213	128	259	301	146	434	152	37	1995
1963	28	8	49	67	156	109	117	152	431	330	306	63	1816
1964	4	3	1	208	214	65	315	114	299	155	352	73	1803
1965	0	42	183	336	157	106	211	245	288	386	200	252	2406
1966	59	142	194	128	313	248	187	246	213	254	141	194	2319
1967	125	5	60	240	338	388	129	221	221	394	167	4	2292
1968	0	34	96	117	218	201	251	128	301	228	44	90	1708
1969	258	37	109	144	164	303	67	352	153	401	329	14	2331
1970	39	0	104	170	297	157	316	283	291	451	190	97	2395
1971	4	322	109	41	316	285	76	159	343	297	305	225	2482
1972	0	83	26	221	127	103	119	229	634	317	340	99	2298
1973	44	8	85	483	227	134	153	229	176	380	159	174	2252
1974	52	10	136	269	440	153	143	345	593	175	245	10	2571
1975	97	144	127	135	252	88	237	131	241	277	266	184	2179
1976	0	36	134	213	315	173	249	139	338	403	189	61	2250
1977	10	25	3	77	217	170	91	339	312	391	49	18	1702
1978	52	1	170	134	211	306	247	148	287	244	130	55	1985
1979	1	52	37	255	144	193	237	221	194	229	281	4	1848
Average	44	52	103	188	238	189	191	217	312	311	208	95	2148
Maximum	258	322	201	483	440	388	316	352	634	451	352	252	2482
Minimum	0	0	1	41	127	65	67	114	146	135	44	4	1702

Table 13 MONTHLY RAINFALL IN ZONE P 2

Station: Selinsing (No. 4906022) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	194	166	269	431	136	94	317	131	166	438	383	428	3153
1961	161	215	403	360	75	68	190	57	110	159	227	218	2243
1962	153	78	283	286	169	155	39	110	67	626	234	174	2374
1963	95	204	256	77	345	120	179	119	234	392	532	269	2822
1964	237	327	147	228	108	115	263	98	304	292	221	171	2511
1965	61	165	333	441	77	4	195	309	330	512	386	258	3071
1966	124	199	232	395	253	253	181	167	177	309	279	272	2841
1967	189	195	185	241	326	98	76	106	192	236	455	175	2474
1968	69	44	306	194	206	227	278	350	154	665	201	337	3031
1969	139	66	222	198	126	222	53	309	185	495	353	387	2755
1970	325	141	204	295	333	53	102	46	260	486	365	324	2934
1971	66	208	177	289	95	42	38	202	152	298	139	426	2732
1972	166	167	184	411	116	125	33	73	280	443	492	375	2865
1973	123	95	279	490	307	99	199	223	222	371	292	272	2972
1974	57	206	99	419	240	108	108	201	225	133	162	171	2129
1975	141	323	260	164	217	153	221	75	228	176	361	347	2666
1976	55	134	258	242	70	65	232	134	190	404	354	268	2406
1977	111	210	117	143	300	95	57	67	161	426	195	280	2162
1978	147	111	215	405	182	102	98	111	110	484	59	100	2124
1979	97	157	194	355	145	171	106	97	328	317	277	58	2302
Average	136	171	231	303	191	118	148	149	204	383	298	266	2598
Maximum	325	327	403	490	345	253	317	350	330	665	532	428	3153
Minimum	55	44	99	77	70	4	33	46	67	133	59	58	2124

Table 14 MONTHLY RAINFALL IN ZONE P 3

Station: Telok Anson (No. 4010098) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	148	210	264	188	79	59	190	80	190	400	364	360	2532
1961	206	322	265	456	42	123	132	112	153	460	384	209	2864
1962	178	99	403	350	290	90	72	237	195	334	257	81	2586
1963	185	295	334	101	253	80	221	108	253	238	577	153	2798
1964	275	262	159	324	40	111	136	122	191	298	173	183	2274
1965	24	129	147	225	203	68	27	201	78	339	401	409	2251
1966	129	251	206	296	65	305	95	104	160	259	372	422	2664
1967	176	173	223	206	180	101	15	23	239	479	347	105	2267
1968	103	57	210	266	250	173	46	217	146	232	192	379	2271
1969	95	63	237	95	334	33	104	174	124	396	375	438	2468
1970	236	65	257	229	223	144	110	99	189	194	333	210	2289
1971	152	255	92	220	107	14	80	107	84	190	362	342	2005
1972	123	130	169	230	30	196	99	22	275	342	242	268	2126
1973	244	109	252	311	273	95	120	141	108	419	208	220	2500
1974	120	152	119	226	63	27	48	10	534	128	260	245	1932
1975	129	207	222	217	178	16	216	32	142	92	307	95	1853
1976	93	38	222	165	101	209	128	190	151	220	128	182	1827
1977	219	174	53	91	85	59	106	111	287	346	441	333	2305
1978	291	91	374	470	121	117	30	79	90	274	206	241	2384
1979	63	234	91	197	96	211	108	124	375	321	349	196	2365
Average	159	166	215	243	151	112	104	115	198	298	314	254	2329
Maximum	291	322	403	470	334	305	221	237	534	479	577	438	2864
Minimum	24	38	53	91	30	14	15	10	78	92	128	81	1827

Table 15 MONTHLY RAINFALL IN ZONE P 4

Station: Pasir Panjang (No. 3510015) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	305	212	86	144	140	71	146	116	172	201	373	305	2271
1961	199	197	129	146	160	108	105	73	83	59	256	257	1772
1962	120	61	99	138	143	94	39	120	95	311	289	44	1553
1963	116	50	146	22	151	59	35	96	142	303	383	213	1716
1964	103	166	108	82	74	65	220	24	191	209	212	232	1686
1965	10	207	79	260	122	2	126	104	126	157	279	357	1829
1966	183	200	152	154	161	173	15	279	219	162	324	215	2237
1967	136	151	45	162	60	142	56	104	150	329	378	151	1864
1968	56	53	148	203	111	132	67	69	203	326	177	322	1867
1969	101	54	95	89	251	150	17	185	125	362	570	322	2321
1970	320	0	197	172	108	78	174	43	43	253	405	145	1938
1971	266	72	71	55	38	115	57	116	86	107	152	174	1309
1972	75	61	35	84	60	217	57	35	141	192	211	122	1290
1973	282	86	230	223	342	95	64	135	226	280	169	121	2253
1974	112	127	107	224	149	31	98	93	151	157	228	60	1537
1975	60	181	91	212	79	3	183	87	161	86	207	171	1521
1976	72	10	164	196	61	127	98	245	48	86	97	197	1401
1977	26	137	10	41	39	99	81	190	169	325	134	81	1332
1978	197	61	75	90	44	90	15	153	90	132	281	186	1414
1979	111	161	99	182	123	94	153	171	138	227	215	91	1765
Average	143	112	108	144	121	97	90	122	138	213	267	188	1743
Maximum	320	212	230	260	342	217	220	279	226	362	570	357	2321
Minimum	10	0	10	22	38	2	15	24	43	59	97	44	1290

Table 16 MONTHLY RAINFALL IN ZONE P 5

Station: Tebong (No. 2423001) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	50	79	136	138	40	173	178	177	178	226	276	170	1823
1961	61	119	106	291	110	150	38	105	72	37	144	201	1436
1962	81	22	284	179	366	96	49	147	82	278	181	74	1838
1963	22	0	52	43	176	150	81	56	194	278	232	110	1393
1964	88	174	255	386	148	76	254	92	126	234	149	165	2147
1965	15	64	84	189	144	75	115	82	129	252	179	175	1504
1966	85	52	119	213	124	57	136	226	54	278	218	234	1796
1967	168	295	65	137	161	78	186	49	117	113	256	181	1805
1968	14	24	203	265	182	74	110	55	176	353	70	207	1733
1969	157	60	139	206	176	262	112	207	102	161	102	452	2136
1970	117	1	133	103	204	207	106	95	198	120	266	241	1791
1971	281	55	301	35	41	108	121	234	184	176	177	256	1970
1972	9	185	28	237	40	153	49	72	172	163	203	109	1419
1973	58	117	154	299	216	46	41	140	209	192	165	87	1727
1974	16	136	94	121	175	179	166	136	170	99	120	122	1537
1975	131	65	199	168	83	60	182	201	155	162	155	241	1802
1976	5	50	167	192	118	143	135	191	223	206	301	59	1790
1977	38	144	11	102	100	74	148	158	112	147	138	79	1251
1978	94	96	192	219	197	107	153	141	69	157	173	104	1702
1979	47	49	182	205	227	81	192	103	167	127	203	14	1597
Average	77	89	145	186	151	117	128	133	144	188	185	164	1709
Maximum	281	295	301	386	366	262	254	234	223	353	301	452	2147
Minimum	5	0	11	35	40	46	38	49	54	37	70	14	1251

Table 17 MONTHLY RAINFALL IN ZONE P 6

Station: Paya Sepayang (No. 2734183) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	471	642	51	18	137	251	101	132	201	192	476	1101	3771
1961	746	267	346	164	189	82	131	147	211	152	806	854	4095
1962	515	107	450	82	79	27	122	403	219	147	456	646	3252
1963	306	231	73	25	138	63	95	244	177	235	178	463	2228
1964	385	789	228	184	286	199	238	138	128	381	524	1686	5165
1965	43	196	47	112	240	235	267	309	215	323	462	496	3735
1966	508	198	243	205	191	154	235	301	147	400	452	450	3486
1967	616	861	497	170	179	378	417	323	226	215	664	1096	5643
1968	203	12	176	227	189	206	127	255	235	240	453	655	2976
1969	220	335	128	52	234	251	156	255	165	303	231	1242	3572
1970	198	53	238	298	152	210	307	256	209	291	340	1253	3808
1971	1255	113	258	73	191	260	101	250	359	351	217	1899	5327
1972	159	60	51	226	202	136	150	202	187	120	342	630	2467
1973	645	179	275	150	154	141	165	102	291	285	533	633	3554
1974	37	236	122	271	82	208	350	158	177	132	478	522	2773
1975	261	171	114	188	347	239	142	151	278	266	642	308	3107
1976	24	20	53	243	243	257	136	263	176	183	203	1281	3082
1977	51	619	40	52	106	203	302	245	95	162	674	592	3141
1978	120	376	59	50	200	208	130	156	167	273	211	286	2236
1979	449	120	191	153	52	176	99	100	118	169	250	783	2660
Average	361	279	182	147	180	194	189	219	198	241	430	844	3463
Maximum	1255	861	497	298	347	378	417	403	359	400	806	1899	5643
Minimum	24	12	40	18	52	27	95	100	95	120	178	286	2228

Table 18 MONTHLY RAINFALL IN ZONE P 7

Station: Paya Kangsar (No. 3924072)

Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	180	196	185	201	256	89	172	218	300	159	420	300	2676
1961	233	96	105	310	182	164	95	103	254	404	167	291	2404
1962	205	114	154	104	116	152	89	283	161	118	282	194	1972
1963	66	84	59	38	105	83	115	100	200	181	326	307	1664
1964	121	202	124	193	144	252	111	85	145	253	411	212	2253
1965	17	77	33	176	410	56	109	148	198	322	266	255	2067
1966	276	89	227	193	106	101	225	138	206	242	271	189	2263
1967	220	445	206	226	211	39	113	58	245	248	480	295	2786
1968	37	0	124	144	164	105	168	164	70	182	70	197	1425
1969	122	38	75	112	218	206	148	333	71	318	203	248	2092
1970	154	46	171	226	182	142	96	134	238	374	244	519	2526
1971	72	114	138	56	234	100	122	318	93	203	224	675	2349
1972	122	184	50	165	134	162	18	269	326	224	145	340	2139
1973	92	49	214	357	194	196	124	280	171	289	296	339	2601
1974	12	182	92	256	120	116	181	142	168	200	344	176	1989
1975	163	202	248	145	225	185	195	121	237	173	391	233	2518
1976	37	16	63	220	88	142	48	179	137	235	186	292	1643
1977	25	169	28	84	118	180	40	247	174	255	212	168	1700
1978	198	69	142	137	308	75	190	65	137	170	254	260	2005
1979	92	49	85	92	79	168	179	71	195	456	340	39	1845
Average	122	121	126	172	180	136	127	173	186	250	277	276	2146
Maximum	276	445	248	357	410	252	225	333	326	456	480	675	2786
Minimum	12	0	28	38	79	39	18	58	70	118	70	39	1425

Table 19 MONTHLY RAINFALL IN ZONE P 8

Station: Kota Bahru (No. 6122064) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	317	59	1	139	73	129	285	229	184	292	744	658	3110
1961	166	50	128	226	59	109	166	201	245	310	1069	927	3656
1962	91	15	165	1	107	181	292	371	366	371	347	594	2901
1963	258	32	16	27	60	161	44	161	180	175	549	349	2012
1964	109	232	247	43	146	63	126	211	164	215	282	395	2233
1965	14	124	40	142	115	245	108	204	205	413	902	1034	3546
1966	517	86	65	69	253	211	139	134	325	354	466	867	3486
1967	1488	181	31	111	118	179	159	180	202	200	649	201	3699
1968	21	8	3	9	181	119	118	223	227	471	214	916	2510
1969	158	36	20	55	20	198	122	105	92	208	1249	278	2541
1970	169	31	49	300	67	39	173	119	291	268	514	562	2582
1971	99	79	228	0	122	32	129	166	91	314	807	601	2668
1972	30	5	2	168	60	59	183	315	210	278	308	465	2083
1973	60	56	477	103	35	216	221	205	143	444	544	1196	3700
1974	22	77	161	89	82	248	85	89	183	344	484	641	2505
1975	462	93	108	29	148	201	91	197	191	296	592	696	3104
1976	38	4	42	55	218	102	173	107	163	226	1523	251	2902
1977	64	52	32	20	117	183	263	253	157	387	627	583	2738
1978	68	29	67	2	104	109	125	254	366	292	615	218	2249
1979	25	4	2	162	77	137	233	82	221	391	694	92	2120
Average	209	63	94	88	108	146	162	190	210	312	659	576	2817
Maximum	1488	232	477	300	253	248	292	371	366	471	1523	1196	3700
Minimum	14	4	1	0	20	32	44	82	91	175	214	92	2012

Table 20 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (1/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
Muda Project (Zone P1)														
CS-I	EW	162	171	186	168	155	136	156	149	141	134	127	134	1,819
	K	-	-	0.92	1.35	1.40	1.15	-	-	0.92	1.35	1.40	0.58	-
	P	-	-	25	30	31	30	-	-	25	31	30	15	217
	FC	-	-	196	257	248	186	-	-	155	212	208	92	1,554
	PS	-	341	37	-	-	-	-	321	30	-	-	-	729
	CWR	0	341	233	257	248	186	0	321	185	212	208	92	2,283
CS-II	EW	162	171	186	168	155	136	156	149	141	134	127	134	1,819
	K	-	-	0.37	1.20	1.40	1.30	0.55	-	0.37	1.20	1.40	1.30	-
	P	-	-	10	30	31	30	31	-	10	31	30	31	234
	FC	-	-	78	232	248	207	117	-	62	192	208	205	1,549
	PS	-	237	151	-	-	-	-	226	120	-	-	-	734
	CWR	0	237	229	232	248	207	117	226	182	192	208	205	2,283
CS-III	EW	162	171	186	168	155	136	156	149	141	134	127	134	1,819
	K	0.58	-	-	0.92	1.35	1.40	1.15	-	-	0.92	1.35	1.40	-
	P	15	-	-	25	31	30	31	-	-	25	30	31	218
	FC	108	-	-	179	240	220	210	-	-	148	201	219	1,525
	PS	-	-	349	35	-	-	-	-	315	29	-	-	728
	CWR	108	0	349	214	240	220	210	0	315	177	201	219	2,253
CS-IV	EW	162	171	186	168	155	136	156	149	141	134	127	134	1,819
	K	1.30	-	-	0.37	1.20	1.40	1.30	0.55	-	0.37	1.20	1.40	-
	P	31	-	-	10	31	30	31	15	-	10	30	31	219
	FC	242	-	-	72	217	220	234	97	-	60	182	219	1,543
	PS	-	-	236	138	-	-	-	-	225	116	-	-	715
	CWR	242	0	236	210	217	220	234	97	225	176	182	219	2,258

Remarks;
- CS : Cropping schedule (see Fig.)
- EW : Open water evaporation
- K : Evapotranspiration - Evaporation ratio
- P : Percolation rate
- FC : Field crop requirement (FC = EW x K + P)
- PS : Presaturation requirement
- CWR: Crop water requirement (CWR = FC + PS)

Table 21 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (2/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
rian Project (Zone P2)														
S-I	EW	161	158	169	154	154	157	161	161	141	147	135	141	1,839
	K	-	0.18	1.35	1.40	1.15	0.37	-	0.18	1.35	1.40	1.15	0.37	-
	P	-	8	56	54	56	18	-	9	54	56	54	19	384
	FC	-	37	284	270	233	76	-	39	244	262	209	71	1,725
	PS	53	273	-	-	-	-	53	267	-	-	-	-	646
	CWR	53	310	284	270	233	76	53	306	244	262	209	71	2,371
S-II	EW	161	158	169	154	154	157	161	161	141	147	135	141	1,839
	K	0.37	-	0.18	1.35	1.40	1.15	0.37	-	0.18	1.35	1.40	1.15	-
	P	19	-	9	54	56	54	19	-	8	56	54	56	385
	FC	78	-	40	262	272	235	78	-	34	254	243	239	1,735
	PS	-	55	271	-	-	-	-	53	259	-	-	-	638
	CWR	78	55	311	262	272	235	78	53	293	254	243	239	2,373
S-III	EW	161	158	169	154	154	157	161	161	141	147	135	141	1,839
	K	1.15	0.37	-	0.18	1.35	1.40	1.15	0.37	-	0.18	1.35	1.40	-
	P	56	17	-	8	56	54	56	19	-	9	54	56	385
	FC	241	75	-	36	264	274	241	78	-	36	236	253	1,734
	PS	-	-	54	265	-	-	-	-	52	259	-	-	630
	CWR	241	75	54	301	264	274	241	78	52	295	236	253	2,364
ungai Manik Project (Zone P3)														
S-I	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	-	0.18	1.15	1.40	1.34	0.37	-	0.18	1.15	1.40	1.34	0.37	-
	P	-	15	102	99	102	33	-	17	99	102	99	34	702
	FC	-	42	306	324	319	91	-	48	290	333	295	86	2,134
	PS	58	292	-	-	-	-	58	294	-	-	-	-	702
	CWR	58	334	306	324	319	91	58	342	290	333	295	86	2,836
S-II	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	0.37	-	0.18	1.15	1.40	1.34	0.37	-	0.18	1.15	1.40	1.34	-
	P	34	-	17	99	102	99	34	-	17	102	99	102	705
	FC	92	-	49	284	329	309	93	-	47	292	303	291	2,089
	PS	-	58	298	-	-	-	-	59	294	-	-	-	709
	CWR	92	58	347	284	329	309	93	59	341	292	303	291	2,798
S-III	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	1.34	0.37	-	0.18	1.15	1.40	1.34	0.37	-	0.18	1.15	1.40	-
	P	102	31	-	17	102	99	102	34	-	17	99	102	705
	FC	312	86	-	47	288	319	318	96	-	47	267	299	2,079
	PS	-	-	60	293	-	-	-	-	59	292	-	-	704
	CWR	312	86	60	340	288	319	318	96	59	339	267	299	2,783

Remarks; see Remarks in Table 20

Table 22 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (3/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
Trans Perak Stage IV Project (Zone P3)														
CS-I	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	0.77	-	-	0.92	1.35	1.40	0.77	-	-	0.92	1.35	1.40	-
	P	42	-	-	50	62	60	42	-	-	52	60	62	430
	FC	162	-	-	198	281	280	165	-	-	203	257	259	1,805
	PS	-	-	309	37	-	-	-	-	306	37	-	-	689
	CWR	162	0	309	235	281	280	165	0	306	240	257	259	2,494
CS-II	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	1.34	0.37	-	0.18	1.15	1.40	1.34	0.37	-	0.18	1.15	1.40	-
	P	62	18	-	10	62	60	62	20	-	10	60	62	426
	FC	272	73	-	40	248	280	278	82	-	40	228	259	1,800
	PS	-	-	68	274	-	-	-	-	67	272	-	-	681
	CWR	272	73	68	314	248	280	278	82	67	312	228	259	2,481
CS-III	EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
	K	1.40	1.25	-	-	0.55	1.25	1.40	1.25	-	-	0.55	1.25	-
	P	62	56	-	-	32	60	62	62	-	-	30	62	426
	FC	282	242	-	-	121	256	287	275	-	-	110	238	1,811
	PS	-	-	-	200	138	-	-	-	-	199	134	-	671
	CWR	282	242	0	200	259	256	287	275	0	199	244	238	2,482
Tanjong Karang Project (Zone P4)														
CS-I	EW	145	148	166	156	153	151	153	157	142	147	135	130	1,783
	K	-	-	1.00	1.40	1.40	0.73	-	-	1.10	1.40	1.40	0.73	-
	P	-	-	56	54	56	36	-	-	54	56	54	37	403
	FC	-	-	223	272	270	147	-	-	210	262	243	132	1,759
	PS	-	334	-	-	-	-	-	330	-	-	-	-	664
	CWR	0	334	223	272	270	147	0	330	210	262	243	132	2,423
CS-II	EW	145	148	166	156	153	151	153	157	142	147	135	130	1,783
	K	0.37	-	0.37	1.20	1.40	1.30	0.37	-	0.37	1.20	1.40	1.30	-
	P	19	-	19	54	56	54	19	-	18	56	54	56	405
	FC	72	-	80	241	270	250	75	-	70	232	243	225	1,758
	PS	-	132	204	-	-	-	-	131	193	-	-	-	660
	CWR	72	132	284	241	270	250	75	131	263	232	243	225	2,418
CS-III	EW	145	148	166	156	153	151	153	157	142	147	135	130	1,783
	K	1.20	-	-	0.73	1.30	1.40	1.20	-	-	0.73	1.30	1.40	-
	P	56	-	-	36	56	54	56	-	-	37	54	56	405
	FC	230	-	-	150	255	265	240	-	-	145	230	238	1,753
	PS	-	-	264	70	-	-	-	-	256	66	-	-	656
	CWR	230	0	264	220	255	265	240	0	256	211	230	238	2,409

Remarks; see Remarks in Table 20

Table 23 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (4/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
Rompin-Endau (Endau River Basin) & Sawah Endau Projects (Zone P6)														
CS-I	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	0.55	-	0.37	1.20	1.40	0.87	-	-	0.55	1.25	1.40	1.25	-
	P	31	-	21	60	62	40	-	-	30	62	60	62	428
	FC	113	-	84	259	276	164	-	-	112	243	241	213	1,705
	PS	-	158	192	-	-	-	-	230	105	-	-	-	685
	CWR	113	158	276	259	276	164	0	230	217	243	241	213	2,390
CS-II	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	1.10	-	-	0.92	1.35	1.40	0.19	-	-	1.10	1.40	1.40	-
	P	62	-	-	50	62	60	10	-	-	31	60	62	397
	FC	226	-	-	202	269	260	37	-	-	191	241	231	1,657
	PS	-	-	313	38	-	-	-	-	339	-	-	-	690
	CWR	226	0	313	240	269	260	37	0	339	191	241	231	2,347
CS-III	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	1.25	0.55	-	0.37	1.20	1.40	0.87	-	-	0.55	1.25	1.40	-
	P	62	28	-	20	62	60	41	-	-	31	60	62	426
	FC	248	111	-	81	246	260	161	-	-	111	221	231	1,670
	PS	-	-	159	192	-	-	-	-	234	101	-	-	686
	CWR	248	111	159	273	246	260	161	0	234	212	221	231	2,356
CS-IV	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	1.40	1.10	-	-	0.92	1.35	1.40	0.19	-	-	1.10	1.40	-
	P	62	56	-	-	52	60	62	10	-	-	60	62	424
	FC	271	222	-	-	192	253	257	38	-	-	202	231	1,666
	PS	-	-	-	313	35	-	-	-	-	332	-	-	680
	CWR	271	222	0	313	227	253	257	38	0	332	202	231	2,346

Remarks; see Remarks in Table 20

Table 24 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (5/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
Rompin-Endau Project (Rompin River Basin) (Zone P6)														
CS-I	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	0.73	-	0.18	1.15	1.40	1.12	-	-	1.37	1.20	1.40	1.30	-
	P	41	-	10	60	62	50	-	-	20	62	60	62	427
	FC	150	-	42	251	276	210	-	-	75	236	241	219	1,700
	PS	-	66	276	-	-	-	-	129	201	-	-	-	672
	CWR	150	66	318	251	276	210	0	129	276	236	241	219	2,372
CS-II	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	1.20	0.37	-	0.55	1.25	1.40	0.63	-	-	0.73	1.30	1.40	-
	P	62	19	-	30	62	60	31	-	-	41	60	62	427
	FC	241	74	-	121	253	260	118	-	-	147	228	231	1,673
	PS	-	-	201	142	-	-	-	-	262	67	-	-	672
	CWR	241	74	201	263	253	260	118	0	262	214	228	231	2,345
CS-III	EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
	K	1.40	1.10	-	-	0.92	1.35	1.40	0.19	-	-	1.10	1.40	-
	P	62	56	-	-	52	60	62	10	-	-	60	62	424
	FC	271	222	-	-	192	253	257	38	-	-	202	231	1,666
	PS	-	-	-	306	35	-	-	-	-	333	-	-	674
	CWR	271	222	0	306	227	253	257	38	0	333	202	231	2,340
Trans Pahang Project (Zone P7)														
CS-I	EW	154	137	168	170	167	156	165	168	165	158	137	144	1,889
	K	1.30	0.18	-	-	1.10	1.40	1.40	0.55	-	0.37	1.20	1.40	-
	P	93	14	-	-	93	90	93	47	-	31	90	93	644
	FC	293	39	-	-	277	308	324	139	-	89	254	295	2,018
	PS	-	-	-	351	-	-	-	-	116	227	-	-	694
	CWR	293	39	0	351	277	308	324	139	116	316	254	295	2,712

Remarks; see Remarks in Table 20

Table 25 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (6/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
Besut and Kemasin Semerak Projects (Zone P8)														
CS-I	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.25	-	-	-	1.10	1.40	1.40	-	-	0.55	1.25	1.40	-
	P	78	-	-	-	78	75	78	-	-	39	75	78	501
	FC	258	-	-	-	261	292	295	-	-	118	228	245	1,697
	PS	-	-	-	379	-	-	-	-	240	107	-	-	726
	CWR	258	0	0	379	261	292	295	0	240	225	228	245	2,423
CS-II	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	0.55	-	-	0.55	1.25	1.40	0.63	-	-	1.10	1.40	-
	P	78	35	-	-	39	75	78	39	-	-	75	78	497
	FC	280	116	-	-	131	269	295	137	-	-	209	245	1,682
	PS	-	-	-	248	119	-	-	-	-	341	-	-	708
	CWR	280	116	0	248	250	269	295	137	0	341	209	245	2,390
CS-III	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	1.26	-	-	-	1.10	1.40	1.40	-	-	0.55	1.25	-
	P	78	70	-	-	-	75	78	78	-	-	38	78	495
	FC	280	255	-	-	-	246	295	298	-	-	105	227	1,706
	PS	-	-	-	-	360	-	-	-	-	234	99	-	693
	CWR	280	255	0	0	360	246	295	298	0	234	204	227	2,399
Kemubu Project (Zone P8)														
CS-I	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.08	-	-	0.37	1.20	1.40	1.30	0.18	-	0.37	1.20	1.40	-
	P	51	-	-	20	62	60	62	10	-	21	60	62	408
	FC	207	-	-	88	262	277	264	39	-	73	206	229	1,645
	PS	-	-	159	204	-	-	-	-	157	176	-	-	696
	CWR	207	0	159	292	262	277	264	39	157	249	206	229	2,341
CS-II	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	0.38	-	-	0.92	1.35	1.40	0.77	-	-	0.92	1.35	-
	P	62	19	-	-	52	60	62	41	-	-	50	62	408
	FC	264	76	-	-	205	269	279	161	-	-	162	223	1,639
	PS	-	-	-	326	37	-	-	-	-	296	31	-	690
	CWR	264	76	0	326	242	269	279	161	0	296	193	223	2,329
CS-III	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	1.08	-	-	0.37	1.20	1.40	1.30	0.18	-	0.37	1.20	-
	P	62	47	-	-	21	60	62	62	10	-	20	62	406
	FC	264	207	-	-	82	246	279	266	39	-	65	205	1,653
	PS	-	-	-	163	190	-	-	-	-	153	167	-	673
	CWR	264	207	0	163	272	246	279	266	39	153	232	205	2,326

Remarks; see Remarks in Table 20

Table 26 CALCULATION OF CROP WATER REQUIREMENT FOR MAJOR SCHEMES IN PENINSULAR MALAYSIA (7/7)

Unit: mm

		J	F	M	A	M	J	J	A	S	O	N	D	Total
North Kelantan Project (Zone P8)														
CS-I	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.08	-	-	0.37	1.20	1.40	1.30	0.18	-	0.37	1.20	1.40	-
	P	51	-	-	20	62	60	62	10	-	21	60	62	408
	FC	207	-	-	88	262	277	264	39	-	73	206	229	1,645
	PS	-	-	209	164	-	-	-	-	207	132	-	-	712
	CWR	207	0	209	252	262	277	264	39	207	205	206	229	2,357
CS-II	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	0.18	-	-	1.10	1.40	1.40	0.55	-	-	1.10	1.40	-
	P	62	9	-	-	62	60	62	31	-	-	60	62	408
	FC	264	36	-	-	246	277	279	117	-	-	194	229	1,642
	PS	-	-	-	376	-	-	-	-	-	335	-	-	711
	CWR	264	36	0	376	246	277	279	117	0	335	194	229	2,353
CS-III	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	0.60	-	-	0.73	1.30	1.40	1.00	-	-	0.73	1.30	-
	P	62	28	-	-	41	60	62	51	-	-	40	62	406
	FC	264	117	-	-	163	62	279	208	-	-	129	217	1,439
	PS	-	-	-	294	74	-	-	-	-	269	61	-	698
	CWR	264	117	0	294	237	62	279	208	0	269	190	217	2,137
CS-IV	EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
	K	1.40	1.08	-	-	0.37	1.20	1.40	1.30	0.18	-	0.37	1.20	-
	P	62	47	-	-	21	60	62	62	10	-	20	62	406
	FC	264	207	-	-	82	246	279	266	39	-	65	205	1,653
	PS	-	-	-	212	148	-	-	-	-	203	122	-	685
	CWR	264	207	0	212	230	246	279	266	39	203	187	205	2,338

Remarks; see Remarks in Table 20

Table 27 CALCULATION OF CROP WATER REQUIREMENT FOR MINOR SCHEMES IN PENINSULAR MALAYSIA (1/2)

Unit: mm

	J	F	M	A	M	J	J	A	S	O	N	D	Total
Zone P 1													
EW	162	171	186	168	155	136	156	149	141	134	127	134	1,819
K	-	-	1.10	1.40	1.40	0.55	-	-	1.10	1.40	1.40	0.55	-
P	-	-	93	90	93	45	-	-	90	93	90	47	641
FC	-	-	298	325	310	120	-	-	245	281	268	121	1,968
PS	-	359	-	-	-	-	-	334	-	-	-	-	693
CWR	0	359	298	325	310	120	0	334	245	281	268	121	2,661
Zone P 2													
EW	161	158	169	154	154	157	161	161	141	147	135	141	1,839
K	-	-	1.10	1.40	1.40	0.55	-	-	1.10	1.40	1.40	0.55	-
P	-	-	93	90	93	45	-	-	90	93	90	47	641
FC	-	-	279	306	309	131	-	-	245	299	279	125	1,973
PS	-	350	-	-	-	-	-	342	-	-	-	-	692
CWR	0	350	279	306	309	131	0	342	245	299	279	125	2,665
Zone P 3													
EW	157	149	177	161	162	157	161	170	166	165	146	141	1,912
K	-	-	1.10	1.40	1.40	0.55	-	-	1.10	1.40	1.40	0.55	-
P	-	-	93	90	93	45	-	-	90	93	90	47	641
FC	-	-	288	315	320	131	-	-	273	324	294	125	2,070
PS	-	344	-	-	-	-	-	347	-	-	-	-	691
CWR	0	344	288	315	320	131	0	347	273	324	294	125	2,761
Zone P 4													
EW	145	148	166	156	153	151	153	157	142	147	135	130	1,783
K	-	-	1.10	1.40	1.40	0.55	-	-	1.10	1.40	1.40	0.55	-
P	-	-	93	90	93	45	-	-	90	93	90	47	641
FC	-	-	276	308	307	128	-	-	246	299	279	119	1,962
PS	-	344	-	-	-	-	-	340	-	-	-	-	684
CWR	0	344	276	308	307	128	0	340	246	299	279	119	2,646
Zone P 5													
EW	153	152	173	156	152	140	144	150	154	156	142	138	1,810
K	0.55	-	-	1.10	1.40	1.40	0.18	-	-	1.10	1.40	1.40	-
P	47	-	-	90	93	90	16	-	-	93	90	93	612
FC	131	-	-	262	306	286	42	-	-	265	289	286	1,867
PS	-	-	350	-	-	-	-	-	340	-	-	-	690
CWR	131	0	350	262	306	286	42	0	340	265	289	286	2,557

Remarks; see Remarks in Table 20

Table 28 CALCULATION OF CROP WATER REQUIREMENT FOR MINOR SCHEMES IN PENINSULAR MALAYSIA (2/2)

Unit: mm

	J	F	M	A	M	J	J	A	S	O	N	D	Total
Zone P 6													
EW	149	151	172	166	153	143	139	144	149	145	129	121	1,761
K	0.55	-	-	1.10	1.40	1.40	0.18	-	-	1.10	1.40	1.40	-
P	47	-	-	90	93	90	16	-	-	93	90	93	612
FC	129	0	-	273	307	290	41	-	-	253	271	262	1,826
PS	-	-	347	-	-	-	-	-	338	-	-	-	685
CWR	129	0	347	273	307	290	41	0	338	253	271	262	2,511
Zone P 7													
EW	154	137	168	170	167	156	165	168	165	158	137	144	1,889
K	1.30	0.18	-	-	1.10	1.40	1.40	0.55	-	0.37	1.20	1.40	-
P	93	14	-	-	93	90	93	47	-	31	90	93	644
FC	293	39	-	-	277	308	324	139	-	89	254	295	2,018
PS	-	-	-	351	-	-	-	-	116	227	-	-	694
CWR	293	39	0	351	277	308	324	139	116	316	254	295	2,712
Zone P 8													
EW	144	148	177	185	167	155	155	157	158	143	122	119	1,830
K	1.40	0.55	-	-	0.55	1.25	1.40	1.25	-	-	1.10	1.40	-
P	93	42	-	-	47	90	93	93	-	-	90	93	641
FC	295	123	-	-	139	284	310	289	-	-	224	260	1,924
PS	-	-	-	180	173	-	-	-	-	330	-	-	683
CWR	295	123	0	180	312	284	310	289	0	330	224	260	2,607

Remarks; see Remarks in Table 20

Table 29 COMPARISON OF EVAPOTRANSPIRATION BETWEEN PREVIOUS AND NEWLY CALCULATED FIGURES

Unit: mm

Major Project	Previous Figure			New Figure			Ratio
	Main	Off	Total(1)	Main	Off	Total(2)	(2)/(1)
Muda II	489	642	1131	565	750	1315	1.16
Krian	604	643	1247	634	695	1329	1.07
Sungei Manik	641	676	1317	671	713	1384	1.05
Tanjong Karang	525	629	1154	639	714	1353	1.17
North Kelantan	650	700	1350	535	698	1233	0.92
Kemubu	610	610	1220	532	699	1231	1.01
Kemasin Semerak	585	595	1180	584	601	1185	1.01
Rompin-Endau	703	502	1205	677	569	1246	1.03

Table 30 MONTHLY EFFECTIVE RAINFALL IN ZONE P 1

Station: Kepala Batas (No. 6204039) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	19	7	120	99	139	133	149	132	190	81	120	19	1208
1961	40	45	66	110	112	127	68	69	166	159	73	125	1160
1962	6	1	79	110	124	77	138	150	88	190	91	22	1076
1963	17	5	29	40	94	65	70	91	189	159	152	38	949
1964	2	2	1	122	124	39	155	68	150	93	166	44	966
1965	0	25	110	161	94	64	123	134	146	176	120	136	1289
1966	35	85	116	77	154	134	112	134	124	136	85	116	1308
1967	75	3	36	132	161	176	77	126	126	178	100	2	1192
1968	0	20	58	70	125	120	135	77	150	128	26	54	963
1969	137	22	65	86	98	151	40	166	92	180	159	8	1204
1970	23	0	62	102	149	94	155	145	147	195	114	58	1244
1971	2	157	65	25	155	146	46	95	163	149	152	128	1283
1972	0	50	16	126	76	62	71	129	250	155	162	59	1156
1973	26	5	51	205	128	80	92	129	106	174	95	104	1195
1974	31	6	82	141	192	92	86	164	238	105	134	6	1277
1975	58	86	76	81	136	53	131	79	132	143	140	110	1225
1976	0	22	80	124	155	104	135	83	161	181	113	37	1195
1977	6	15	2	46	125	102	55	162	154	177	29	11	884
1978	31	1	102	80	123	152	134	89	146	133	78	33	1102
1979	1	31	22	137	86	116	131	126	116	129	144	2	1041
Average	25	29	62	104	128	104	105	117	152	151	113	56	1146
Maximum	137	157	120	205	192	176	155	166	250	195	166	136	1308
Minimum	0	0	1	25	76	39	40	68	88	81	26	2	884

Table 31 MONTHLY EFFECTIVE RAINFALL IN ZONE P 2

Station: Selinsing (No. 4906022) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	116	100	141	189	82	56	155	79	100	191	175	188	1572
1961	97	125	181	168	45	41	114	34	66	95	128	125	1219
1962	92	47	145	146	101	93	23	66	40	248	130	104	1235
1963	57	121	137	46	164	72	107	71	130	178	220	141	1444
1964	131	158	88	128	65	69	139	59	151	148	126	103	1365
1965	37	99	160	192	46	2	117	153	159	214	176	137	1492
1966	74	119	30	179	136	136	109	100	106	153	144	142	1528
1967	113	117	111	132	158	59	46	64	115	131	197	105	1348
1968	41	26	152	116	122	128	143	165	92	260	120	161	1526
1969	83	40	127	119	76	127	32	153	111	209	166	176	1419
1970	158	85	121	149	160	32	61	28	138	206	170	157	1465
1971	40	122	106	147	57	25	23	121	91	149	83	188	1152
1972	100	100	110	183	70	75	20	44	144	193	208	173	1420
1973	74	57	144	207	152	59	119	127	127	171	148	142	1527
1974	34	122	59	186	132	65	65	120	128	80	97	103	1191
1975	85	157	138	98	125	92	126	45	128	106	168	164	1432
1976	33	80	137	133	42	39	130	80	114	181	166	140	1275
1977	67	123	70	86	150	57	34	40	97	188	117	144	1173
1978	88	67	125	182	109	61	59	67	66	205	35	60	1124
1979	58	94	116	167	87	103	64	58	158	155	143	35	1238
Average	79	98	125	148	104	70	84	84	113	173	146	134	1357
Maximum	158	158	181	207	164	136	155	165	159	260	220	188	1572
Minimum	33	26	59	46	42	2	20	28	40	80	35	35	1124

Table 32 MONTHLY EFFECTIVE RAINFALL IN ZONE P 3

Station: Telok Anson (No. 4010098)

Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	89	123	139	113	47	35	114	48	114	180	169	168	1339
1961	122	157	140	197	25	74	79	67	92	198	175	123	1449
1962	107	60	181	165	147	54	43	131	117	160	137	49	1351
1963	111	149	160	61	136	48	126	65	136	131	233	92	1448
1964	143	139	95	157	24	67	82	73	115	149	104	110	1258
1965	14	77	88	128	121	41	16	120	47	162	180	183	1177
1966	77	135	122	149	39	152	57	62	96	138	172	187	1386
1967	106	104	127	122	108	61	9	14	132	204	164	63	1214
1968	62	34	123	140	135	104	28	125	88	130	115	174	1258
1969	57	38	131	57	160	20	62	104	74	179	173	191	1246
1970	131	39	137	129	127	86	66	59	113	116	160	123	1286
1971	91	137	55	126	64	8	48	64	50	114	169	163	1089
1972	74	78	101	129	18	118	59	13	143	163	133	140	1169
1973	133	65	136	153	142	57	72	85	65	186	122	126	1342
1974	72	91	71	128	38	16	29	6	220	77	138	134	1020
1975	77	122	127	125	107	10	125	19	85	55	152	57	1061
1976	56	23	127	99	61	123	77	114	91	126	77	109	1083
1977	126	104	32	55	51	35	64	67	146	164	192	160	1196
1978	147	55	172	201	73	70	18	47	54	142	122	132	1233
1979	38	130	55	118	58	123	65	74	173	156	165	118	1273
Average	92	93	116	128	84	65	62	68	108	147	153	130	1244
Maximum	147	157	181	201	160	152	126	131	220	204	233	191	1449
Minimum	14	23	32	55	18	8	9	6	47	55	77	49	1020

Table 33 MONTHLY EFFECTIVE RAINFALL IN ZONE P 4

Station: Pasir Panjang (No. 3510015) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	152	124	52	86	84	43	88	70	103	120	172	152	1246
1961	119	118	77	88	96	65	63	44	50	35	137	137	1029
1962	72	37	59	83	86	56	23	72	57	153	147	26	871
1963	70	30	88	13	91	35	21	58	85	151	175	124	941
1964	62	100	65	49	44	39	126	14	115	123	124	130	991
1965	6	122	47	138	73	1	76	62	76	94	144	167	1006
1966	110	120	91	92	97	104	9	144	126	97	157	125	1272
1967	82	91	27	97	36	85	34	62	90	159	173	91	1027
1968	34	32	89	121	67	79	40	41	121	158	106	157	1045
1969	61	32	57	53	135	90	10	111	75	169	231	157	1181
1970	156	0	118	103	65	47	104	26	26	136	182	87	1050
1971	140	43	43	33	23	69	34	70	52	64	91	104	766
1972	45	37	21	50	36	125	34	21	85	115	123	73	765
1973	145	52	129	127	163	57	38	81	128	144	101	73	1238
1974	67	76	64	127	89	19	59	56	91	94	128	36	906
1975	36	109	55	124	47	2	110	52	97	52	122	103	909
1976	43	6	98	118	37	76	59	134	29	52	58	118	828
1977	16	82	6	25	23	59	49	114	101	158	80	49	762
1978	118	37	45	54	26	54	9	92	54	79	144	112	824
1979	67	97	59	109	74	56	92	103	83	128	125	55	1048
Average	80	67	65	85	70	58	54	71	82	114	136	104	986
Maximum	156	124	129	138	163	125	126	144	128	169	231	167	1272
Minimum	6	0	6	13	23	1	9	14	26	35	58	26	762

Table 34 MONTHLY EFFECTIVE RAINFALL IN ZONE P 5

Station: Tebong (No. 2423001) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	30	47	82	83	24	104	107	106	107	128	143	102	1063
1961	37	71	64	147	66	90	23	63	43	22	86	120	832
1962	49	13	145	107	170	58	29	88	49	143	109	44	1004
1963	13	0	32	26	106	90	49	34	116	143	130	66	805
1964	53	104	137	176	89	46	136	55	76	130	89	99	1190
1965	9	38	50	113	86	45	69	49	77	136	107	105	884
1966	51	31	71	124	74	34	82	128	32	143	125	130	1025
1967	101	149	39	82	97	47	112	29	70	68	137	109	1040
1968	8	14	121	140	109	44	66	33	106	166	42	122	971
1969	94	36	83	122	106	139	67	122	61	97	61	196	1184
1970	70	1	80	62	121	122	64	57	119	72	140	132	1040
1971	144	33	150	21	25	65	73	130	110	106	106	137	1100
1972	5	111	17	131	24	92	29	43	103	98	121	65	839
1973	35	70	92	150	125	28	25	84	123	115	99	52	998
1974	10	82	56	73	105	107	100	82	102	59	72	73	921
1975	79	39	119	101	50	36	109	120	93	97	93	132	1068
1976	3	30	100	115	71	86	81	115	127	122	150	35	1035
1977	23	86	7	61	60	44	89	95	67	88	83	47	750
1978	56	58	115	126	118	64	92	85	41	94	104	62	1015
1979	28	29	109	122	128	49	115	62	100	76	121	8	947
Average	45	52	83	104	88	70	76	79	86	105	106	92	986
Maximum	144	149	150	176	170	139	136	130	127	166	150	196	1190
Minimum	3	0	7	21	24	28	23	29	32	22	42	8	750

Table 35 MONTHLY EFFECTIVE RAINFALL IN ZONE P 6

Station: Paya Sepayang (No. 2734183) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	201	253	31	11	82	135	61	79	120	115	203	390	1681
1961	284	140	164	98	113	49	79	88	123	91	302	316	1847
1962	215	64	195	49	47	16	73	181	126	88	197	254	1505
1963	152	129	44	15	83	38	57	133	106	131	107	199	1194
1964	176	297	128	110	146	119	131	83	77	174	217	566	2224
1965	26	118	28	67	132	131	140	153	125	157	199	209	1485
1966	212	119	133	122	115	92	131	150	88	180	196	195	1733
1967	245	318	209	102	107	173	185	157	128	125	259	389	2397
1968	121	7	106	128	113	122	76	137	131	132	196	257	1526
1969	126	161	77	31	130	135	94	137	99	151	129	433	1703
1970	119	32	131	149	91	123	152	137	123	147	162	436	1802
1971	437	68	137	44	115	138	61	135	168	165	125	630	2223
1972	95	36	31	128	121	82	90	121	112	72	163	249	1300
1973	254	107	143	90	92	85	99	61	147	146	220	250	1694
1974	22	131	73	141	49	122	165	95	106	79	203	217	1403
1975	138	103	68	113	164	132	85	91	143	140	253	152	1582
1976	14	12	32	133	133	137	82	139	106	110	121	444	1463
1977	31	246	24	31	64	121	151	134	57	97	262	238	1456
1978	72	173	35	30	120	122	78	94	100	142	123	146	1235
1979	195	72	115	92	31	106	59	60	71	101	135	295	1332
Average	157	129	95	84	102	109	102	118	113	127	189	313	1639
Maximum	437	318	209	149	164	173	185	181	168	180	302	630	2397
Minimum	14	7	24	11	31	16	57	60	57	72	107	146	1194

Table 36 MONTHLY EFFECTIVE RAINFALL IN ZONE P 7

Station: Paya Kangsar (No. 3924072) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	108	118	111	120	137	53	103	125	150	95	186	150	1456
1961	130	58	63	153	109	98	57	62	136	181	100	147	1294
1962	122	68	92	62	70	91	53	145	97	71	145	116	1132
1963	40	50	35	23	63	50	69	60	120	109	158	152	929
1964	73	121	74	116	86	136	67	51	87	136	183	124	1254
1965	10	46	20	106	183	34	65	89	119	157	140	137	1106
1966	143	53	128	116	64	61	128	83	122	133	141	113	1285
1967	126	194	122	128	123	23	68	35	134	134	204	149	1440
1968	22	0	74	86	98	63	101	98	42	109	42	118	853
1969	73	23	45	67	125	122	89	160	43	155	121	134	1157
1970	92	28	103	128	109	85	58	80	131	172	133	216	1335
1971	43	68	83	34	130	60	73	155	56	121	127	263	1213
1972	73	110	30	99	80	97	11	141	158	127	87	162	1175
1973	55	29	124	167	116	118	74	144	103	147	149	162	1388
1974	7	109	55	137	72	70	109	85	101	120	163	106	1134
1975	98	121	134	87	128	111	117	73	131	104	177	130	1411
1976	22	10	38	126	53	85	29	107	82	131	112	148	943
1977	15	101	17	50	71	108	24	134	104	137	124	101	986
1978	119	41	85	82	152	45	114	39	82	102	136	138	1135
1979	55	29	51	55	47	101	107	43	117	197	162	23	987
Average	71	69	74	97	101	81	76	95	106	132	140	139	1181
Maximum	143	194	134	167	183	136	128	160	158	197	204	263	1456
Minimum	7	0	17	23	47	23	11	35	42	71	42	23	853

Table 37 MONTHLY EFFECTIVE RAINFALL IN ZONE P 8

Station: Kota Bahru (No. 6122064) Unit: mm

Year	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sep.	Oct.	Nov.	Dec.	Total
1960	155	35	1	83	44	77	146	129	110	148	283	257	1468
1961	100	30	77	128	35	65	100	120	134	153	381	338	1661
1962	55	9	99	1	64	109	148	171	170	171	164	238	1399
1963	137	19	10	16	36	97	26	97	108	105	225	165	1041
1964	65	130	134	26	88	38	76	123	98	125	145	179	1227
1965	8	74	24	85	69	134	65	121	122	184	331	370	1587
1966	215	52	39	41	136	123	83	80	158	166	200	320	1613
1967	506	109	19	67	71	107	95	108	121	120	255	120	1698
1968	13	5	2	5	109	71	71	127	128	201	124	335	1191
1969	95	22	12	33	12	119	73	63	55	122	435	143	1184
1970	101	19	29	150	40	23	104	71	147	140	214	229	1267
1971	59	47	128	0	73	19	77	100	55	154	302	240	1254
1972	18	3	1	101	36	35	110	155	123	143	152	200	1077
1973	36	34	203	62	21	125	126	122	86	193	223	419	1650
1974	13	46	97	53	49	134	51	53	110	163	205	252	1226
1975	199	56	65	17	89	120	55	118	115	149	238	269	1490
1976	23	2	25	33	125	61	104	64	98	128	517	135	1315
1977	38	31	19	12	70	110	139	136	94	176	248	235	1308
1978	41	17	40	1	62	65	75	136	170	148	245	125	1125
1979	15	2	1	97	46	82	130	49	126	177	268	55	1048
Average	95	37	51	51	64	86	93	107	116	153	258	231	1341
Maximum	506	130	203	150	136	134	148	171	170	201	517	419	1698
Minimum	8	2	1	0	12	19	26	49	55	105	124	55	1041

Table 38 ESTIMATED AREA OF IRRIGATED PADDY FIELD

Unit: ha

Basin No.	Basin Name	Scheme	1980 Main Season	1980 Off Season	1990 Main Season	1990 Off Season	2000 Main Season	2000 Off Season
1	Perlis	Minor	6815	-	11708	2266	13355	2428
2	P. Langkawi	Minor	2692	319	3120	319	3120	319
3	Kedah	Major	95860	91580	95860	91580	95860	91580
		Minor	1083	473	7166	1820	13000	3426
4	Merbok+	Minor	2074	399	2624	825	2624	825
5	Muda	Minor	15670	13590	22506	13619	23612	17112
6	Perai+	Minor	5893	5678	6351	5678	6351	5678
7	P. Pinang	Minor	1189	566	1189	821	1189	870
8	Kerian	Minor	982	977	1956	1813	2321	1951
9	Kurau+	Major	23490	21142	23490	21142	23490	21142
		Minor	2543	2543	2700	2700	2700	2700
10	Perak	Major	6555	5900	16269	13994	16269	15614
		Minor	16663	11993	17044	12997	17044	12997
11	Bernam	Major	19263	19263	19263	19263	19263	19263
12-15	Tengi+	-	-	-	-	-	-	-
16	Langat	Minor	1481	983	1503	1005	1519	1005
17	Sepang+	Minor	81	69	81	69	81	69
18	Linggi+	Minor	4067	2072	4321	2391	4380	2391
19	Melaka+	Minor	6366	1366	7197	3049	7537	3171
20	Kesang	Minor	2339	1649	2600	1792	2600	1792
21	Muar+	Minor	7006	3541	8633	5777	9056	5963
22	Batu Pahat+	Minor	142	142	142	142	142	142
23	Pontian Kechil	Minor	176	176	176	176	176	176
24	Johor+	Minor	109	-	109	-	109	-
25-26	Sedili Besar	-	-	-	-	-	-	-
27	Endau	Major	-	-	11540	7896	13564	11540
		Minor	1150	1150	304	304	304	304
28	Rompin	Major	-	-	5859	5859	5859	5859
		Minor	-	-	69	-	69	-
29	Bebar+	Minor	221	-	869	-	869	-
30	Pahang+	Major	-	-	5261	2023	13354	7284
		Minor	19870	1980	20918	8172	22108	8055
31	Kuantan+	Minor	511	-	827	-	827	-
32	Kemaman+	Minor	635	379	671	415	671	415
33	Paka	Minor	162	-	162	-	162	-
34	Dungun	Minor	66	32	1280	639	1467	826
35	Marang+	Minor	695	238	1375	622	2104	1351
36	Trengganu	Minor	9195	3811	11177	4744	11177	5181
37	Setiu+	Minor	1841	431	2619	836	3200	1417
38	Besut+	Major	5058	4047	5058	4047	5058	4047
		Minor	1008	583	1453	927	1453	927
39	Kemasin+	Major	-	-	8904	4857	8904	4857
		Minor	-	-	1831	462	6096	2345
40	Kelantan+	Major	29630	28628	29630	28628	29630	28628
		Minor	8581	447	12814	3502	17046	6556
41	Golok	Minor	607	-	13426	5047	26245	10094
	Total		301769	226147	392055	282218	435965	310300

Table 39 IRRIGATION WATER DEMAND FOR MUDA PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	119.27	173.85	198.09	199.20	139.48	105.67	69.13	122.90	77.36	170.44	117.98	246.84	1740.21
1961	107.66	156.45	258.74	175.74	177.52	114.12	143.79	164.71	105.57	0.	187.30	110.05	1701.66
1962	126.46	176.60	244.14	175.74	160.62	184.57	79.27	110.95	197.29	0.	160.75	242.97	1859.35
1963	120.38	174.77	300.31	325.05	202.88	201.48	141.95	150.11	78.53	0.	70.79	222.32	1988.56
1964	128.67	176.14	331.76	150.14	160.62	238.11	65.60	165.37	124.39	143.65	50.14	214.58	1947.17
1965	129.78	165.61	209.32	66.96	202.88	202.88	93.09	121.57	129.09	0.	117.98	95.86	1535.03
1966	110.42	138.13	202.58	246.13	118.35	104.26	103.23	121.57	154.96	47.64	169.60	121.67	1638.55
1967	88.30	175.68	292.44	128.81	108.49	45.09	135.49	126.88	152.61	0.	147.48	268.78	1670.05
1968	129.78	167.90	267.73	261.06	159.21	123.99	82.03	159.60	124.39	65.50	256.61	201.67	1999.27
1969	54.01	166.98	259.87	226.93	197.25	80.31	169.60	100.33	192.58	0.	60.47	261.03	1769.37
1970	117.06	177.05	263.24	192.80	125.39	160.62	63.60	114.27	127.91	0.	126.83	196.51	1665.30
1971	128.67	105.16	259.87	357.05	116.94	87.35	164.07	147.45	109.10	18.62	70.79	106.18	1671.26
1972	129.78	154.16	314.91	141.61	228.25	205.70	141.02	124.89	6.81	5.22	56.04	195.22	1703.62
1973	115.40	174.77	275.59	0.	154.98	180.34	121.67	124.89	176.12	0.	154.85	137.15	1615.77
1974	112.64	174.31	240.77	109.62	64.81	163.44	127.20	101.66	20.92	116.86	97.33	263.62	1593.16
1975	97.70	137.68	247.51	237.60	143.71	218.38	85.72	158.07	145.55	32.01	88.49	129.41	1721.84
1976	129.78	166.98	243.02	145.88	116.94	146.53	82.03	155.62	111.45	0.	128.30	223.61	1649.95
1977	126.46	170.19	330.63	312.25	159.21	149.35	155.77	102.99	119.68	0.	252.19	257.16	2135.88
1978	112.64	176.60	218.31	239.73	162.03	78.90	82.96	151.43	129.09	54.34	179.92	228.77	1814.71
1979	129.23	162.86	308.17	118.15	214.16	129.62	85.72	126.88	164.36	63.27	82.59	268.78	1853.78
AVERAGE	115.70	163.59	263.35	190.52	155.69	146.03	109.55	132.59	122.39	35.88	128.82	199.61	1763.72

Table 40 IRRIGATION WATER DEMAND FOR KRIAN PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	19.21	36.22	42.33	27.43	55.99	44.37	13.43	43.40	50.69	27.01	18.95	13.07	392.08
1961	21.91	31.70	31.55	34.26	68.03	47.89	19.06	52.30	60.88	61.70	35.93	29.52	494.73
1962	22.62	45.79	41.25	41.41	49.81	35.67	31.57	45.97	68.67	6.41	35.21	35.00	459.39
1963	27.60	32.43	43.41	73.94	29.32	40.61	20.02	44.98	41.71	31.71	4.34	25.34	415.40
1964	17.07	25.75	56.63	47.27	61.52	41.31	15.62	47.35	35.41	42.55	36.65	35.26	462.41
1965	30.45	36.40	37.21	26.45	67.70	57.06	18.65	28.76	33.02	18.70	18.58	26.38	399.36
1966	25.19	32.79	45.30	30.68	38.43	25.57	19.75	39.24	48.90	40.74	30.15	25.08	401.80
1967	19.63	33.15	50.42	45.97	31.27	43.66	28.40	46.36	66.20	48.69	11.00	34.74	439.51
1968	29.88	49.58	39.37	51.17	42.98	27.45	15.07	26.38	53.09	2.89	38.82	20.12	396.81
1969	21.90	47.05	46.11	50.20	57.94	27.68	30.33	28.76	47.40	20.50	22.20	16.20	418.27
1970	13.23	38.93	47.73	40.44	30.62	50.01	26.34	53.49	39.31	21.59	20.75	21.16	403.59
1971	30.02	32.25	51.77	41.09	64.12	51.66	31.57	35.09	53.39	42.19	52.19	13.07	498.40
1972	21.48	36.22	50.69	29.18	59.89	39.90	31.98	50.32	37.51	26.29	7.02	16.98	407.67
1973	25.19	43.98	41.52	21.57	33.22	43.66	18.37	33.90	42.60	34.24	28.70	25.08	392.05
1974	30.88	32.25	66.45	28.40	39.73	42.25	25.79	35.29	42.30	67.12	47.13	35.26	490.86
1975	23.62	25.93	43.14	57.03	42.00	35.91	17.41	50.12	42.30	57.73	21.48	19.33	436.00
1976	31.02	39.83	43.41	45.64	69.00	48.36	16.86	43.20	46.50	30.62	22.20	25.60	462.25
1977	26.18	32.07	61.48	66.93	33.87	44.13	30.05	51.11	51.59	28.09	39.91	24.56	483.98
1978	23.19	42.18	46.65	29.70	47.21	43.19	26.62	45.77	60.88	21.95	69.54	46.49	503.38
1979	27.46	37.30	49.08	34.58	54.36	33.32	25.93	47.55	33.32	40.02	30.51	53.02	466.46
AVERAGE	24.49	36.59	46.68	40.88	48.85	41.18	23.14	42.47	46.78	33.54	29.56	27.06	441.22

Table 41 IRRIGATION WATER DEMAND FOR SUNGAI MANIK PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	14.83	11.22	12.69	22.50	27.94	22.45	12.60	17.88	15.12	17.54	13.75	11.14	199.67
1961	12.63	9.21	12.63	13.49	30.50	19.25	14.78	16.67	16.78	15.40	13.03	15.23	189.41
1962	13.63	14.95	9.83	16.92	17.21	20.89	17.02	12.58	14.89	19.92	17.56	21.96	197.40
1963	13.36	9.68	11.26	28.08	18.39	21.38	11.85	16.80	13.45	23.38	6.12	18.05	191.83
1964	11.22	10.28	15.69	17.78	30.41	19.83	14.59	16.29	15.04	21.24	21.50	16.42	210.28
1965	19.84	13.95	16.17	20.89	20.00	21.95	18.71	13.29	20.19	19.69	12.44	9.78	206.89
1966	15.63	10.51	13.85	18.64	28.80	12.87	16.15	16.99	16.48	22.55	13.39	9.41	195.26
1967	13.70	12.35	13.51	21.54	21.40	20.32	19.14	20.06	13.76	14.68	14.35	20.69	205.48
1968	16.64	16.49	13.78	19.61	18.50	16.80	17.96	12.97	17.08	23.50	20.19	10.60	204.11
1969	16.97	16.26	13.24	28.51	15.82	23.67	15.84	14.31	18.14	17.66	13.27	9.05	202.74
1970	12.03	16.20	12.83	20.79	19.36	18.27	15.59	17.18	15.19	25.17	14.82	15.23	202.66
1971	14.70	10.39	18.41	21.11	26.12	24.66	16.71	16.86	19.96	25.41	13.75	11.60	219.67
1972	15.83	13.89	15.28	20.79	31.05	15.65	16.03	20.12	12.92	19.57	18.04	13.69	212.86
1973	11.89	14.66	12.90	18.21	17.75	20.64	15.22	15.52	18.82	16.83	19.35	14.96	196.76
1974	15.97	13.12	17.32	20.89	28.91	24.00	17.90	20.57	7.10	29.82	17.44	14.23	227.27
1975	15.63	11.28	13.51	21.22	21.50	24.49	11.92	19.74	17.31	32.44	15.78	21.24	226.05
1976	17.04	17.14	13.51	24.00	26.44	15.24	14.93	13.67	16.86	23.98	24.71	16.51	224.01
1977	12.36	12.35	19.98	28.72	27.51	22.45	15.72	16.67	12.70	19.45	11.01	11.87	210.78
1978	10.96	15.25	10.45	13.06	25.15	19.58	18.58	17.95	19.66	22.07	19.35	14.42	206.47
1979	18.24	10.81	18.41	21.97	26.76	15.24	15.65	16.22	10.65	20.40	14.23	15.69	204.28
AVERAGE	14.66	13.00	14.26	20.94	23.97	19.98	15.84	16.62	15.61	21.53	15.70	14.59	206.70

Table 42 IRRIGATION WATER DEMAND FOR TANJONG KARANG PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	10.73	38.57	72.36	56.28	63.50	61.84	21.33	47.04	51.68	41.09	23.44	21.11	508.76
1961	15.47	39.41	64.51	55.58	59.30	55.15	24.92	51.53	68.30	70.86	35.70	25.67	566.40
1962	22.22	53.39	70.16	57.34	62.80	57.89	30.66	46.69	66.11	29.53	32.20	59.42	588.40
1963	22.51	54.60	61.06	81.85	61.05	64.27	30.95	49.11	57.32	30.23	22.39	29.62	564.97
1964	23.66	42.52	68.28	69.24	77.51	63.05	15.87	56.71	47.91	40.03	40.25	27.80	572.83
1965	31.70	38.72	73.92	38.07	67.35	74.61	23.05	48.42	60.15	50.19	33.25	16.55	555.98
1966	16.77	39.06	60.12	54.18	58.94	43.29	32.67	34.26	44.46	49.14	28.69	29.32	490.92
1967	20.79	44.07	80.20	52.43	80.31	49.07	29.08	48.42	55.76	27.43	23.09	39.66	550.29
1968	27.68	54.26	60.75	44.03	69.45	50.89	28.22	52.05	46.03	27.78	46.56	19.59	527.28
1969	23.80	54.26	70.79	67.84	45.64	47.55	32.53	39.96	60.46	23.92	2.89	19.59	489.22
1970	10.16	59.78	51.65	50.33	70.15	60.62	19.03	54.64	75.83	35.48	19.94	40.87	548.49
1971	12.46	57.36	75.18	74.85	84.86	55.93	29.08	47.04	67.68	60.70	51.81	35.70	645.65
1972	26.10	53.39	82.08	68.89	80.51	36.91	29.08	55.50	57.32	42.84	40.60	45.13	618.16
1973	11.74	50.80	48.70	41.92	35.83	57.58	28.51	45.14	43.84	32.68	48.31	45.15	489.68
1974	22.94	46.66	68.59	41.92	61.75	69.13	25.49	49.46	55.44	50.19	38.85	56.38	586.81
1975	27.39	40.96	71.41	42.98	76.46	74.30	18.17	50.15	53.56	64.90	40.95	36.01	597.24
1976	26.39	58.75	57.93	45.08	79.96	53.80	25.49	35.99	74.89	64.90	63.37	31.45	615.99
1977	30.26	45.62	86.79	77.65	84.86	56.97	26.93	39.44	52.31	27.78	55.66	52.43	636.70
1978	15.62	53.39	74.55	67.49	83.81	58.49	32.67	43.24	67.05	55.45	33.25	33.27	618.28
1979	22.94	45.03	70.16	48.23	67.00	57.89	20.75	41.34	57.95	38.28	39.90	50.60	558.08
AVERAGE	21.07	48.17	68.43	56.81	68.54	57.26	26.22	46.81	58.20	43.17	36.05	35.77	566.51

Table 43 IRRIGATION WATER DEMAND FOR BESUT PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	10,82	9,76	0.	12,32	18,13	14,13	10,96	5,92	5,67	13,18	0.	0.	100,90
1961	15,88	9,99	0.	10,67	18,79	15,01	14,35	6,25	5,30	12,80	0.	0.	109,04
1962	20,02	10,96	0.	15,34	16,65	11,77	10,82	4,38	4,75	11,42	4,57	0,43	111,11
1963	12,48	10,50	0.	14,79	18,71	12,66	19,79	7,10	5,70	16,48	0,09	6,81	125,11
1964	19,10	5,40	0.	14,42	14,89	17,00	16,11	6,14	5,86	14,94	6,31	5,52	125,69
1965	24,34	7,97	0.	12,25	16,29	9,93	16,92	6,22	5,49	10,42	0.	0.	109,83
1966	5,30	8,98	0.	13,87	11,36	10,74	15,60	7,73	4,94	11,80	1,26	0.	91,57
1967	0.	6,36	0.	12,91	16,14	11,92	14,72	6,70	5,50	15,33	0.	10,94	100,52
1968	23,88	11,14	0.	15,19	13,34	14,57	16,48	6,00	5,40	9,12	8,25	0.	123,37
1969	16,34	10,36	0.	14,16	20,48	11,04	16,34	8,35	6,51	15,17	0.	8,83	127,59
1970	15,79	10,50	0.	9,86	18,42	18,10	14,05	8,08	5,10	13,79	0,43	0,98	115,09
1971	19,65	9,21	0.	15,38	15,99	18,40	16,04	6,99	6,51	12,72	0.	0,31	121,20
1972	23,42	11,25	0.	11,66	18,21	17,22	13,61	4,97	5,47	13,56	5,67	3,59	129,12
1973	21,76	9,81	0.	13,10	19,82	10,60	12,44	6,18	6,04	9,73	0,15	0.	109,63
1974	23,88	9,26	0.	13,43	17,76	9,93	17,95	8,72	5,67	12,03	0,83	0.	119,46
1975	6,77	8,80	0.	14,75	14,81	10,96	17,66	6,33	5,59	13,10	0.	0.	98,79
1976	22,96	11,28	0.	14,16	12,17	15,31	14,05	8,31	5,86	14,71	0.	9,56	128,38
1977	21,58	9,95	0.	14,94	16,21	11,70	13,48	5,67	5,92	11,04	0.	0,61	109,09
1978	21,30	10,59	0.	15,34	16,80	15,01	16,19	5,67	4,75	13,18	0.	10,48	129,32
1979	23,70	11,28	0.	11,81	17,98	13,76	12,14	8,87	5,43	10,96	0.	16,92	132,84
AVERAGE	17,45	9,67	0.	13,52	16,67	13,49	14,89	6,73	5,57	12,78	1,38	3,75	115,88

Table 44 IRRIGATION WATER DEMAND FOR KEMUBU PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	71,69	26,94	11,97	47,61	61,37	57,77	39,55	27,08	6,88	27,12	0.	0.	377,97
1961	74,69	27,49	9,09	40,19	63,90	61,48	53,76	28,72	4,73	26,09	0.	0.	390,14
1962	77,15	29,77	8,26	61,13	55,74	47,89	38,93	19,38	1,50	22,36	12,47	0.	374,58
1963	72,67	28,68	11,63	58,66	63,62	51,59	76,62	32,94	7,05	36,02	0.	17,67	457,16
1964	76,60	16,59	6,94	57,01	68,98	69,82	61,17	28,18	7,95	31,88	18,32	13,09	436,53
1965	79,72	22,69	11,10	47,28	54,33	40,16	64,57	28,54	5,80	19,67	0.	0.	373,87
1966	68,41	25,09	10,53	54,53	35,47	43,56	59,01	36,05	2,58	23,40	1,39	0.	360,02
1967	52,51	18,88	11,29	50,25	53,77	48,50	55,30	30,92	5,89	32,92	0.	32,39	392,62
1968	79,44	30,21	11,93	60,47	43,07	59,63	62,72	27,44	5,26	16,15	24,78	0.	421,11
1969	74,96	28,36	11,55	55,85	70,38	44,80	62,10	39,17	11,80	32,50	0.	24,86	456,34
1970	74,64	28,68	10,91	36,56	62,50	74,46	52,52	37,70	3,56	28,78	0.	0.	410,31
1971	76,93	25,63	7,16	61,29	53,21	75,69	60,86	32,39	11,80	25,88	0.	0.	430,85
1972	79,17	30,43	11,97	44,64	63,62	70,75	50,67	22,31	5,71	28,16	16,16	6,22	429,80
1973	78,19	27,05	4,33	51,07	67,84	42,94	45,72	28,36	9,03	17,81	0.	0.	372,34
1974	79,44	25,74	8,34	52,56	59,96	40,16	68,89	41,00	6,88	24,02	0.	0.	406,99
1975	69,28	24,65	9,55	58,49	48,70	44,49	67,66	29,09	6,43	26,91	0.	0.	385,26
1976	78,90	30,54	11,06	55,85	38,57	62,72	52,52	38,98	7,95	31,26	0.	27,48	435,83
1977	78,08	27,38	11,29	59,32	54,05	47,58	41,71	25,79	8,31	21,33	0.	0.	374,82
1978	77,92	28,90	10,49	61,13	56,30	61,48	61,48	25,79	1,50	27,12	0.	30,75	442,87
1979	79,34	30,54	11,97	45,30	60,81	56,23	44,49	41,73	5,44	21,12	0.	53,65	450,61
AVERAGE	74,99	26,71	10,07	52,96	55,81	55,08	56,01	31,08	6,30	26,02	3,66	10,51	409,00

Table 45 IRRIGATION WATER DEMAND FOR NORTH KELANTAN PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	21,48	16,26	8,05	35,26	39,77	39,99	27,29	16,37	7,84	22,35	0.	0.	234,66
1961	32,62	16,66	7,08	29,81	41,55	42,52	37,02	17,56	7,32	21,75	0.	0.	253,90
1962	41,74	18,33	6,79	45,18	35,82	33,22	26,87	10,82	6,56	19,57	6,28	0.	251,17
1963	25,12	17,53	7,94	43,37	41,35	35,75	52,68	20,60	7,88	27,56	0.	11,64	291,42
1964	39,72	8,73	6,34	42,16	31,09	48,24	42,10	17,16	8,09	25,14	10,03	8,67	287,46
1965	51,27	13,17	7,76	35,03	34,84	27,93	44,43	17,43	7,58	18,00	0.	0.	257,41
1966	9,32	14,92	7,57	40,34	21,61	30,25	40,62	22,85	6,81	20,17	0.	0.	214,45
1967	0.	10,39	7,82	37,19	34,44	33,64	38,08	19,15	7,60	25,74	0.	21,16	235,22
1968	50,26	18,64	8,04	44,70	26,94	41,25	43,16	16,63	7,45	15,94	14,17	0.	287,19
1969	33,64	17,30	7,91	41,31	46,09	31,10	42,74	25,10	9,01	25,50	0.	16,29	295,98
1970	32,42	17,53	7,69	27,15	40,56	51,41	36,18	24,04	7,05	23,32	0.	0.	267,35
1971	40,93	15,31	6,42	45,30	34,05	52,26	41,89	20,20	9,01	21,63	0.	0.	287,00
1972	49,24	18,80	8,05	33,08	41,35	48,87	34,91	12,93	7,56	22,96	8,65	4,23	290,64
1973	45,59	16,34	5,45	37,80	44,32	29,83	31,52	17,30	8,35	16,91	0.	0.	253,41
1974	50,26	15,39	6,82	38,89	38,79	27,93	47,39	26,42	7,84	20,54	0.	0.	280,25
1975	12,56	14,60	7,23	43,25	30,89	30,89	46,54	17,82	7,73	22,23	0.	0.	233,74
1976	48,23	18,88	7,75	41,31	23,78	43,37	36,18	24,96	8,09	24,77	0.	17,98	295,31
1977	45,19	16,58	7,82	43,85	34,64	33,00	28,77	15,44	8,18	18,96	0.	0.	252,45
1978	44,58	17,69	7,55	45,18	36,22	42,52	42,31	15,44	6,56	22,35	0.	20,10	300,52
1979	49,85	18,88	8,05	33,56	39,38	38,93	30,68	26,95	7,49	18,84	0.	34,91	307,53
AVERAGE	36,20	16,10	7,41	39,18	35,87	38,14	38,57	19,26	7,70	21,71	1,96	6,75	268,85

Table 46 IRRIGATION WATER DEMAND FOR TRANS PERAK STAGE IV PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	28,17	8,89	11,67	22,88	31,74	34,88	20,90	15,02	15,24	17,72	13,07	14,83	235,01
1961	22,99	6,22	11,63	12,58	34,98	29,14	25,47	13,72	16,54	15,07	12,01	22,78	223,11
1962	25,34	13,83	9,61	16,51	17,02	32,08	30,18	9,32	15,07	20,66	18,72	35,84	244,19
1963	24,72	6,85	10,64	29,26	18,64	32,96	19,33	13,85	13,95	24,92	2,06	28,25	225,44
1964	19,69	7,65	13,83	17,49	35,12	30,17	25,08	13,30	15,18	22,28	24,54	25,07	249,40
1965	39,94	12,50	14,18	21,04	20,85	33,99	33,72	10,08	19,19	20,36	11,12	12,18	249,16
1966	30,05	7,95	12,51	18,47	32,92	17,66	28,35	14,06	16,30	23,89	12,54	11,48	226,18
1967	25,50	10,38	12,26	21,78	22,76	31,05	34,63	17,35	14,18	14,18	13,95	33,37	251,41
1968	32,41	15,87	12,46	19,57	18,79	24,72	32,15	9,73	16,77	25,07	22,60	15,77	243,92
1969	33,19	15,56	12,07	29,75	15,11	37,09	27,70	11,18	17,60	17,86	12,36	10,77	240,23
1970	21,58	15,48	11,77	20,92	19,97	27,37	27,18	14,27	15,30	27,13	14,65	22,78	238,40
1971	27,86	7,79	15,80	21,29	29,24	38,85	29,53	13,92	19,01	27,43	13,07	15,71	259,49
1972	30,52	12,42	13,54	20,92	36,01	22,66	28,09	17,42	13,54	20,22	19,42	19,78	254,54
1973	21,26	13,44	11,82	17,98	17,76	31,64	26,39	12,48	18,13	18,83	21,36	22,25	231,34
1974	30,84	11,40	15,01	21,04	33,06	37,67	32,02	17,90	9,00	32,87	18,54	20,83	280,20
1975	30,05	8,97	12,26	21,41	22,91	38,56	19,46	17,01	16,95	36,11	16,07	34,43	274,19
1976	33,35	16,73	12,26	24,60	29,68	21,93	25,74	10,49	16,60	25,66	29,31	25,25	271,60
1977	22,36	10,38	16,92	30,00	31,15	34,88	27,44	13,72	13,36	20,07	9,00	16,24	245,52
1978	19,07	14,22	10,06	12,09	27,91	29,73	33,45	15,09	18,77	23,31	21,36	21,19	246,25
1979	36,18	8,34	15,80	22,27	30,12	21,93	27,31	13,24	11,77	21,25	13,77	23,66	245,62
AVERAGE	27,75	11,24	12,81	21,09	26,29	30,45	27,70	13,66	15,62	22,64	15,98	21,52	246,76

Table 47 IRRIGATION WATER DEMAND FOR ROMPIN-ENDAU PROJECT (ROMPIN RIVER BASIN) IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	4,47	0,84	16,78	28,01	18,11	12,09	10,07	4,53	12,00	15,55	2,24	0,	124,69
1961	0,	5,40	9,69	19,26	14,81	20,74	9,11	4,37	11,82	18,11	0,	0,	113,31
1962	3,15	9,45	8,04	24,19	21,84	24,06	9,43	2,72	11,65	18,43	2,84	0,	135,78
1963	9,11	5,98	16,09	27,61	18,00	21,85	10,28	3,57	12,83	13,85	12,43	2,98	154,58
1964	6,84	0,58	11,61	18,05	11,29	13,70	6,34	4,46	14,55	9,27	1,24	0,	97,93
1965	21,04	6,57	16,94	22,38	12,78	12,49	5,86	3,21	11,70	11,08	2,63	1,92	128,61
1966	3,43	6,52	11,35	16,84	14,59	16,42	6,34	3,27	13,89	8,63	2,95	3,41	107,63
1967	0,92	0,46	7,30	18,86	15,45	8,27	3,46	3,14	11,53	14,49	0,	0,	83,87
1968	12,05	12,48	12,78	16,24	14,81	13,40	9,27	3,50	11,35	13,74	2,95	0,	122,57
1969	11,57	4,28	14,33	26,00	13,00	12,09	8,31	3,50	13,24	11,72	10,08	0,	128,12
1970	12,24	11,15	11,45	14,13	17,15	13,30	5,22	3,50	11,82	12,14	6,57	0,	118,67
1971	0,	9,23	11,13	24,69	14,59	11,79	10,07	3,53	9,16	10,23	10,51	0,	114,94
1972	14,51	10,94	16,78	16,24	13,96	17,42	8,52	3,78	12,47	20,13	6,46	0,	141,22
1973	0,60	7,16	10,81	20,06	17,04	17,12	8,04	4,85	10,40	12,25	1,03	0,	109,37
1974	21,42	5,88	14,54	14,93	21,63	13,40	4,53	4,24	12,83	19,39	2,24	1,07	136,09
1975	10,44	7,37	14,81	17,75	9,37	12,39	8,79	4,31	10,64	12,89	0,	7,99	116,75
1976	22,18	12,22	16,72	15,74	12,68	11,89	8,95	3,46	12,83	16,09	10,94	0,	143,69
1977	20,57	0,88	17,15	26,00	20,03	13,50	5,27	3,55	15,73	17,47	0,	0,	140,16
1978	16,69	3,64	16,56	26,10	14,06	13,40	9,16	4,26	13,18	12,68	10,72	8,63	149,09
1979	5,04	9,02	12,30	19,86	23,54	15,01	10,17	4,86	14,90	17,04	9,45	0,	141,21
AVERAGE	9,81	6,50	13,36	20,65	15,94	14,72	7,86	3,83	12,43	14,26	4,76	1,30	125,41

Table 48 IRRIGATION WATER DEMAND FOR ROMPIN-ENDAU PROJECT (ENDAU RIVER BASIN) IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,84	1,29	11,92	18,26	12,08	7,74	6,01	5,36	12,19	12,88	2,34	0,	93,91
1961	0,	5,01	6,88	12,42	9,91	15,26	5,43	5,21	12,00	15,27	0,	0,	85,39
1962	2,62	8,29	5,70	15,71	14,53	15,38	5,62	3,66	11,81	15,57	2,91	0,	101,81
1963	8,11	5,48	11,43	17,99	12,01	13,97	6,14	4,46	13,05	11,29	11,86	2,74	118,54
1964	6,02	1,03	8,24	11,62	7,60	8,77	3,76	5,29	14,86	7,01	1,29	0,	75,49
1965	19,08	5,96	12,03	14,50	8,58	8,00	3,47	4,13	11,88	8,71	2,71	1,74	100,78
1966	2,89	5,92	8,05	10,81	9,77	10,50	3,76	4,18	14,18	6,42	3,01	3,13	82,61
1967	0,72	0,91	5,17	12,15	10,33	5,30	2,03	4,06	11,69	11,89	0,	0,	64,25
1968	10,81	10,75	9,08	10,41	9,91	8,57	5,53	4,39	11,50	11,19	3,01	0,	95,15
1969	10,37	4,10	10,18	16,92	8,72	7,74	4,95	4,39	13,49	9,30	9,68	0,	99,84
1970	10,98	9,67	8,13	9,00	11,45	8,51	3,09	4,39	12,00	9,70	6,39	0,	93,31
1971	0,	8,12	7,90	16,04	9,77	7,55	6,01	4,43	9,20	7,91	10,07	0,	87,00
1972	13,07	9,50	11,92	10,41	9,35	11,14	5,08	4,66	12,69	17,16	6,29	0,	111,26
1973	0,42	6,43	7,67	12,96	11,38	10,95	4,79	5,65	10,51	9,80	1,07	0,	81,64
1974	19,43	5,40	10,33	9,53	14,39	8,57	2,67	5,09	13,06	16,47	2,34	1,04	108,32
1975	9,33	6,41	10,52	11,41	6,34	7,93	5,24	5,16	10,76	10,40	0,	7,41	91,09
1976	20,12	10,53	11,88	10,07	8,51	7,61	5,33	4,36	13,06	13,38	10,47	0,	115,33
1977	18,64	1,33	12,19	16,92	13,34	8,64	3,12	4,44	16,11	16,67	0,	0,	109,40
1978	15,07	3,59	11,77	16,98	9,42	8,57	5,46	5,11	13,43	10,20	10,27	8,01	117,88
1979	4,37	7,94	8,74	12,82	15,65	9,60	6,07	5,67	15,23	14,28	9,08	0,	109,45
AVERAGE	8,79	5,89	9,49	13,35	10,65	9,41	4,68	4,70	12,64	11,68	4,64	1,20	97,12

Table 49 IRRIGATION WATER DEMAND FOR SAWAH ENDAU PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	4,26	1,36	12,52	19,17	12,68	8,12	6,31	5,94	13,52	14,29	2,59	0,	100,75
1961	0,	5,44	7,22	13,04	10,40	13,92	5,70	5,77	13,31	16,94	0,	0,	91,74
1962	2,91	9,05	5,99	16,49	15,26	16,15	5,90	4,06	13,10	17,27	3,23	0,	109,40
1963	8,99	5,96	12,00	18,89	12,61	14,66	6,44	4,95	14,48	12,52	13,16	3,03	127,69
1964	6,67	1,09	8,65	12,19	7,98	9,20	3,95	5,86	16,48	7,78	1,43	0,	81,29
1965	21,16	6,48	12,63	15,22	9,01	8,39	3,64	4,58	13,17	9,65	3,01	1,93	106,88
1966	3,20	6,44	8,45	11,35	10,26	11,02	3,95	4,63	15,72	7,12	3,34	3,48	88,95
1967	0,80	0,96	5,43	12,76	10,85	5,56	2,13	4,50	12,96	13,18	0,	0,	69,13
1968	11,98	11,76	9,53	10,93	10,40	9,00	5,80	4,87	12,76	12,41	3,34	0,	102,78
1969	11,50	4,44	10,88	17,76	9,15	8,12	5,19	4,87	14,96	10,32	10,73	0,	107,74
1970	12,18	10,57	8,53	9,45	12,02	8,93	3,24	4,87	13,31	10,76	7,09	0,	100,95
1971	0,	8,86	8,29	16,84	10,26	7,92	6,31	4,91	10,21	8,77	11,17	0,	93,54
1972	14,49	10,38	12,52	10,93	9,82	11,70	5,33	5,17	14,07	19,03	6,98	0,	120,40
1973	0,47	7,01	8,06	13,60	11,95	11,49	5,03	6,27	11,65	10,87	1,19	0,	87,58
1974	21,54	5,87	10,84	10,01	15,11	9,00	2,80	5,64	14,48	18,26	2,59	1,16	117,31
1975	10,34	7,20	11,04	11,98	6,65	8,33	5,50	5,72	11,93	11,53	0,	8,22	98,44
1976	22,31	11,52	12,48	10,57	8,93	7,99	5,60	4,83	14,48	14,84	11,61	0,	125,17
1977	20,67	1,40	12,79	17,76	14,01	9,07	3,27	4,93	17,86	16,27	0,	0,	118,03
1978	16,71	3,87	12,36	17,83	9,89	9,00	5,73	5,66	14,89	11,31	11,39	8,88	127,54
1979	4,84	8,67	9,37	13,46	16,43	10,08	6,37	6,29	16,89	15,83	10,07	0,	118,11
AVERAGE	9,75	6,42	9,96	14,01	11,18	9,88	4,91	5,22	14,01	12,95	5,15	1,33	104,77

Table 50 IRRIGATION WATER DEMAND FOR TRANS PAHANG PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	17,70	1,85	0,	8,50	5,15	9,38	8,13	7,32	6,32	21,14	6,50	13,87	105,85
1961	15,59	2,80	0,	7,28	6,18	7,72	9,82	10,33	6,76	12,91	14,73	14,16	108,30
1962	16,56	2,64	0,	10,65	7,61	7,98	9,97	8,36	8,01	23,44	10,43	17,12	120,55
1963	24,20	2,93	0,	12,06	7,87	9,49	9,38	10,43	7,27	19,80	9,18	13,68	126,30
1964	21,04	1,80	0,	8,64	7,03	6,33	9,45	10,86	8,32	17,22	6,79	16,36	113,84
1965	27,07	3,00	0,	9,01	3,46	10,08	9,53	9,04	7,31	15,21	10,90	15,11	119,71
1966	14,35	2,88	0,	8,64	7,83	9,09	7,21	9,33	7,21	17,50	10,81	17,41	112,26
1967	15,97	0,63	0,	8,20	5,66	10,48	9,42	11,62	6,83	17,41	4,78	13,97	104,98
1968	25,92	3,73	0,	9,75	6,58	9,01	8,20	8,61	9,76	19,80	20,28	16,93	138,58
1969	21,04	3,36	0,	10,65	5,59	6,84	8,64	5,64	9,73	15,40	12,72	15,40	114,82
1970	19,23	3,28	0,	8,20	6,18	8,20	9,78	9,47	6,92	13,77	11,57	7,56	104,18
1971	23,91	2,64	0,	11,66	5,41	9,12	9,23	5,88	9,31	18,65	12,15	3,06	111,04
1972	21,04	1,97	0,	9,27	7,25	7,76	11,51	6,55	6,06	18,08	15,97	12,72	118,20
1973	22,77	3,27	0,	6,77	5,92	6,99	9,20	6,41	7,82	16,17	10,04	12,72	108,06
1974	27,36	1,99	0,	7,87	7,54	8,75	7,91	9,23	7,88	18,75	8,70	18,08	124,06
1975	18,65	1,80	0,	9,71	5,48	7,25	7,61	9,80	6,92	20,28	7,37	15,78	110,66
1976	25,92	3,57	0,	8,28	8,24	8,20	10,85	8,18	8,48	17,70	13,58	14,06	127,06
1977	26,59	2,12	0,	11,07	7,58	7,36	11,03	6,89	7,78	17,12	12,44	18,56	128,53
1978	16,64	3,08	0,	9,89	4,60	9,67	7,72	11,43	8,48	20,47	11,29	15,02	118,30
1979	22,77	3,27	0,	10,89	8,46	7,61	7,98	11,24	7,37	11,38	8,80	26,02	125,79
AVERAGE	21,21	2,63	0,	9,34	6,48	8,37	9,13	8,73	7,73	17,61	10,95	14,88	117,05

Table 51 IRRIGATION WATER DEMAND FOR KEMASIN-SEMERAK PROJECT IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	19.10	17.24	0.	10.85	18.56	16.96	13.16	13.03	7.32	17.54	0.	0.	133.76
1961	28.01	17.65	0.	9.39	19.25	18.02	17.22	13.76	6.84	17.01	0.	0.	147.14
1962	35.29	19.35	0.	13.50	17.03	14.13	12.98	9.63	6.13	15.10	7.85	0.16	151.16
1963	22.02	18.54	0.	13.02	19.17	15.19	23.76	15.62	7.36	22.11	0.	11.98	168.76
1964	33.67	9.55	0.	12.69	15.20	20.40	19.34	13.52	7.55	19.99	10.79	9.71	172.41
1965	42.90	14.08	0.	10.78	16.65	11.92	20.31	13.68	7.08	13.72	0.	0.	151.13
1966	9.39	15.87	0.	12.21	11.52	12.89	18.72	17.00	6.37	15.63	2.28	0.	121.88
1967	0.	11.25	0.	11.37	16.50	14.31	17.66	14.73	7.10	20.52	0.	19.27	132.69
1968	42.09	19.67	0.	13.37	13.59	17.49	19.78	13.19	6.96	11.91	14.04	0.	172.09
1969	28.82	18.29	0.	12.47	21.01	13.25	19.60	18.37	8.41	20.30	0.	15.54	176.07
1970	27.85	18.54	0.	8.68	18.87	21.72	16.87	17.73	6.58	18.39	0.12	1.62	156.96
1971	34.64	16.27	0.	13.53	16.34	22.08	19.25	15.38	8.41	16.90	0.	0.	162.81
1972	41.28	19.83	0.	10.26	19.17	20.66	16.34	10.93	7.06	18.07	9.71	6.31	179.64
1973	38.37	17.32	0.	11.53	20.32	12.72	14.92	13.60	7.79	12.76	0.	0.	149.34
1974	42.09	16.35	0.	11.82	18.18	11.92	21.55	19.18	7.32	15.95	1.51	0.	165.87
1975	11.98	15.54	0.	12.98	15.12	13.16	21.19	13.92	7.22	17.44	0.	0.	128.55
1976	40.47	19.91	0.	12.47	12.36	18.37	16.87	18.29	7.55	19.67	0.	16.84	182.80
1977	38.04	17.57	0.	13.15	16.57	14.04	13.78	12.47	7.63	14.57	0.	0.65	148.46
1978	37.56	18.70	0.	13.50	17.18	18.02	19.43	12.47	6.13	17.54	0.	18.46	178.98
1979	41.77	19.91	0.	10.39	18.41	16.51	14.57	19.51	7.00	14.46	0.	29.79	192.33
AVERAGE	30.77	17.07	0.	11.90	17.05	16.19	17.86	16.60	7.19	16.98	2.32	6.52	158.64

Table 52 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 1 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	14.50	7.33	9.31	7.05	2.20	0.	43.00	11.71	42.57	31.51	23.74	192.92
1961	0.	12.94	9.56	8.86	8.16	2.33	0.	56.41	16.82	25.97	41.51	12.45	195.00
1962	0.	14.75	9.02	8.86	7.66	3.36	0.	39.17	33.42	19.37	37.68	23.42	196.71
1963	0.	14.58	11.08	11.74	8.90	3.60	0.	51.73	11.92	25.97	24.69	21.71	185.94
1964	0.	14.71	12.24	8.36	7.66	4.14	0.	56.62	20.92	40.02	21.71	21.07	206.77
1965	0.	13.76	7.75	6.76	8.90	3.63	0.	42.57	21.07	22.35	31.51	11.28	169.58
1966	0.	11.29	7.50	10.22	6.43	2.18	0.	42.57	25.76	30.67	38.96	13.41	189.18
1967	0.	14.67	10.79	7.95	6.14	1.32	0.	44.28	25.33	21.93	35.76	25.54	193.71
1968	0.	13.97	9.89	10.51	7.62	2.47	0.	54.71	20.22	32.57	51.52	20.01	223.48
1969	0.	13.88	9.60	9.85	8.73	1.83	0.	35.76	32.57	21.50	23.20	24.91	181.84
1970	0.	14.79	9.72	9.19	6.83	3.01	0.	40.23	20.86	18.31	32.78	19.58	175.11
1971	0.	8.32	9.60	12.36	6.59	1.94	0.	50.88	17.46	28.10	24.69	12.13	171.66
1972	0.	12.73	11.62	8.20	9.64	3.67	0.	43.64	0.	26.82	22.56	19.48	158.36
1973	0.	14.58	10.18	6.94	7.50	3.30	0.	43.64	29.59	22.78	36.83	14.69	188.02
1974	0.	14.54	8.90	7.58	4.86	3.05	0.	36.19	1.49	37.47	28.52	25.12	167.72
1975	0.	11.25	9.15	10.05	7.17	3.85	0.	54.28	24.05	29.38	27.25	14.05	190.48
1976	0.	13.88	8.98	8.28	6.39	2.80	0.	53.43	17.88	21.29	33.00	21.82	187.75
1977	0.	14.17	12.20	11.49	7.62	2.84	0.	36.61	19.37	22.14	50.88	24.59	201.92
1978	0.	14.75	8.08	10.09	7.70	1.81	0.	52.15	21.07	31.51	40.45	22.25	209.86
1979	0.	13.51	11.37	7.75	9.23	2.55	0.	44.28	27.46	32.36	26.40	25.54	200.45
AVERAGE	0.	13.58	9.73	9.12	7.52	2.79	0.	46.11	19.91	27.64	33.07	19.84	189.33

Table 53 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 2 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	2.04	1.03	1.31	0.99	0.31	0.	11.46	3.12	11.35	8.40	6.33	46.33
1961	0.	1.82	1.35	1.25	1.15	0.33	0.	15.03	4.48	6.92	11.06	3.32	46.71
1962	0.	2.08	1.27	1.23	1.08	0.47	0.	10.44	8.91	5.16	10.04	6.24	46.93
1963	0.	2.05	1.56	1.65	1.25	0.51	0.	13.78	3.18	6.92	6.58	5.79	43.28
1964	0.	2.07	1.72	1.18	1.08	0.58	0.	15.09	5.39	10.66	5.79	5.62	49.18
1965	0.	1.94	1.09	0.95	1.25	0.51	0.	11.35	5.62	5.96	8.40	3.01	40.66
1966	0.	1.59	1.06	1.44	0.90	0.31	0.	11.35	6.86	8.23	10.38	3.57	45.69
1967	0.	2.06	1.52	1.12	0.86	0.19	0.	11.80	6.75	5.84	9.53	6.81	46.48
1968	0.	1.97	1.39	1.46	1.07	0.35	0.	14.58	5.39	8.68	13.73	5.33	53.97
1969	0.	1.95	1.35	1.39	1.23	0.26	0.	9.53	8.68	5.73	6.18	6.64	42.94
1970	0.	2.08	1.37	1.29	0.93	0.42	0.	10.72	5.56	4.88	8.74	5.22	41.22
1971	0.	1.17	1.35	1.74	0.90	0.27	0.	13.56	4.65	7.49	6.58	3.23	40.95
1972	0.	1.79	1.64	1.15	1.36	0.52	0.	11.63	0.	7.15	6.01	5.19	36.44
1973	0.	2.05	1.43	0.70	1.06	0.46	0.	11.63	7.69	6.07	9.81	3.91	45.01
1974	0.	2.05	1.25	1.07	0.68	0.43	0.	9.64	0.40	9.98	7.60	6.69	39.80
1975	0.	1.58	1.29	1.42	1.01	0.54	0.	14.47	6.41	7.83	7.26	3.74	45.55
1976	0.	1.95	1.26	1.17	0.90	0.39	0.	14.24	4.77	5.67	8.79	5.81	44.96
1977	0.	2.00	1.72	1.62	1.07	0.40	0.	9.76	5.16	5.90	13.56	6.55	47.73
1978	0.	2.08	1.14	1.42	1.08	0.24	0.	13.98	5.62	8.40	10.78	5.93	50.59
1979	0.	1.90	1.60	1.09	1.30	0.36	0.	11.80	7.32	8.62	7.03	6.81	47.83
AVERAGE	0.	1.91	1.37	1.28	1.06	0.39	0.	12.29	5.31	7.37	8.81	5.29	45.08

Table 54 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 3 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	8.54	5.89	7.48	5.66	1.77	0.	19.30	7.17	26.06	19.28	14.53	115.67
1961	0.	7.62	7.68	7.11	6.55	1.87	0.	25.32	10.29	15.90	25.41	7.62	115.37
1962	0.	8.69	7.25	7.11	6.15	2.70	0.	17.58	20.46	11.86	23.06	14.33	119.19
1963	0.	8.59	8.90	9.43	7.15	2.90	0.	23.22	7.30	15.90	15.11	13.29	111.78
1964	0.	8.66	9.83	6.72	6.15	3.33	0.	25.42	12.38	24.49	13.29	12.90	123.17
1965	0.	8.11	6.22	5.43	7.15	2.91	0.	19.11	12.90	13.68	19.28	6.91	101.69
1966	0.	6.65	6.02	8.21	5.16	1.75	0.	19.11	15.77	18.89	23.84	8.21	113.61
1967	0.	8.64	8.67	6.39	4.93	1.06	0.	19.87	15.50	13.42	21.89	15.63	116.01
1968	0.	8.23	7.94	8.44	6.12	1.99	0.	24.56	12.38	19.93	31.53	12.25	133.36
1969	0.	8.18	7.71	7.91	7.02	1.47	0.	16.05	19.93	13.16	14.20	15.24	110.88
1970	0.	8.71	7.81	7.38	5.33	2.42	0.	18.06	12.77	11.21	20.06	11.99	105.73
1971	0.	6.90	7.71	9.93	5.13	1.56	0.	22.84	10.68	17.20	15.11	7.43	102.48
1972	0.	7.50	9.33	6.59	7.74	2.95	0.	19.59	0.	16.42	13.81	11.92	95.84
1973	0.	8.59	8.17	3.97	6.02	2.65	0.	19.59	18.11	13.94	22.54	8.99	112.57
1974	0.	8.57	7.15	6.09	3.90	2.45	0.	16.24	0.91	22.93	17.46	15.37	101.08
1975	0.	6.62	7.35	8.07	5.76	3.09	0.	24.36	14.72	17.98	16.68	8.60	113.24
1976	0.	8.18	7.21	6.65	5.13	2.25	0.	23.98	10.94	13.03	20.20	13.35	110.93
1977	0.	8.35	9.79	9.23	6.12	2.28	0.	16.43	11.86	13.55	31.14	15.05	123.81
1978	0.	8.69	6.49	8.11	6.19	1.46	0.	23.41	12.90	19.28	24.76	13.62	124.89
1979	0.	7.96	9.13	6.22	7.41	2.05	0.	19.87	16.81	19.80	16.16	15.63	121.05
AVERAGE	0.	8.00	7.81	7.32	6.04	2.24	0.	20.70	12.19	16.93	20.24	12.14	113.62

Table 55 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 4 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	5,28	2,67	3,39	2,56	0,80	0.	9,64	2,62	9,54	7,06	5,32	48,80
1961	0.	4,71	3,48	3,22	2,97	0,85	0.	12,64	3,77	5,82	9,30	2,79	49,56
1962	0.	5,37	3,28	3,22	2,79	1,22	0.	8,78	7,49	4,34	8,44	5,25	50,20
1963	0.	5,31	4,04	4,27	3,24	1,31	0.	11,59	2,67	5,82	5,53	4,87	48,66
1964	0.	5,36	4,45	3,04	2,79	1,51	0.	12,69	4,53	8,97	4,87	4,72	52,93
1965	0.	5,01	2,82	2,46	3,24	1,32	0.	9,54	4,72	5,01	7,06	2,53	43,71
1966	0.	4,11	2,73	3,72	2,34	0,80	0.	9,54	9,77	6,92	8,73	3,01	47,66
1967	0.	5,34	3,93	2,90	2,24	0,48	0.	9,92	5,68	4,91	8,02	5,73	49,14
1968	0.	5,08	3,60	3,82	2,78	0,90	0.	12,26	4,53	7,30	11,55	4,48	56,31
1969	0.	5,06	3,50	3,59	3,18	0,67	0.	8,02	7,30	4,82	5,20	5,58	46,90
1970	0.	5,38	3,54	3,34	2,41	1,09	0.	9,02	4,68	4,10	7,35	4,39	45,31
1971	0.	3,03	3,50	4,50	2,32	0,70	0.	11,40	3,91	6,30	5,53	2,72	43,92
1972	0.	4,63	4,23	2,99	3,51	1,33	0.	9,78	0.	6,01	5,06	4,37	41,91
1973	0.	5,31	3,71	1,80	2,73	1,20	0.	9,78	4,63	5,10	8,25	3,29	47,81
1974	0.	5,30	3,24	2,76	1,77	1,11	0.	8,11	0,33	8,40	6,39	5,63	43,04
1975	0.	4,10	3,33	3,66	2,61	1,40	0.	12,17	5,39	6,58	6,11	3,15	48,49
1976	0.	5,06	3,27	3,01	2,32	1,02	0.	11,97	4,01	4,77	7,39	4,89	47,72
1977	0.	5,16	4,44	4,19	2,78	1,03	0.	8,21	4,34	4,98	11,40	5,51	52,02
1978	0.	5,37	2,94	3,68	2,81	0,66	0.	11,69	4,72	7,06	9,08	4,99	52,97
1979	0.	4,92	4,14	2,82	3,36	0,93	0.	9,92	6,15	7,25	5,92	5,73	51,14
AVERAGE	0.	4,94	3,54	3,32	2,74	1,02	0.	10,33	4,46	6,20	7,41	4,45	48,41

Table 56 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 5 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	87,16	44,08	55,96	42,34	13,25	0.	82,66	22,51	81,84	60,56	45,63	535,98
1961	0.	77,75	57,45	53,24	49,03	13,99	0.	108,44	32,33	49,92	79,79	23,94	545,88
1962	0.	88,65	54,23	53,24	46,06	20,18	0.	75,29	64,24	37,24	72,43	45,01	556,57
1963	0.	87,66	66,61	70,57	53,49	21,67	0.	99,44	22,92	49,92	47,47	41,74	561,47
1964	0.	88,40	73,54	50,27	46,06	24,89	0.	108,85	38,87	76,93	41,74	40,51	590,85
1965	0.	82,70	46,55	40,61	53,49	21,79	0.	81,84	40,51	42,97	60,56	21,69	492,71
1966	0.	67,85	45,07	61,41	38,63	13,12	0.	81,84	49,51	59,33	74,88	25,78	517,43
1967	0.	88,15	64,88	47,79	34,90	7,92	0.	85,11	46,69	42,15	68,75	49,10	539,44
1968	0.	83,94	59,43	63,14	45,81	14,86	0.	105,16	38,87	42,61	99,03	38,46	611,32
1969	0.	83,45	57,70	59,18	52,50	11,02	0.	68,75	62,61	41,33	44,60	47,88	529,00
1970	0.	88,89	58,44	55,22	39,87	18,08	0.	77,34	40,10	35,19	63,02	37,65	513,79
1971	0.	50,02	57,70	74,29	38,38	11,64	0.	97,80	33,55	54,01	47,47	23,32	488,18
1972	0.	76,51	69,63	49,28	57,94	22,04	0.	83,89	0.	51,56	43,38	37,44	491,86
1973	0.	87,66	61,16	29,71	45,07	19,81	0.	83,89	56,88	43,78	70,79	28,23	526,98
1974	0.	87,41	53,49	45,56	29,22	18,32	0.	69,56	2,86	72,02	54,83	48,29	481,57
1975	0.	67,60	54,97	60,42	43,09	23,15	0.	104,35	46,24	56,47	52,38	27,01	535,67
1976	0.	83,45	53,98	49,77	38,38	16,84	0.	102,71	34,37	40,92	63,43	41,94	525,79
1977	0.	85,18	73,29	69,09	45,81	17,09	0.	70,38	37,24	42,54	97,80	47,26	585,69
1978	0.	88,65	48,53	60,67	44,30	10,90	0.	100,25	40,51	60,56	77,75	42,76	576,88
1979	0.	81,22	68,34	46,55	55,47	15,35	0.	85,11	52,79	62,20	50,74	49,10	566,88
AVERAGE	0.	81,61	58,46	54,80	45,19	16,79	0.	88,63	38,28	53,18	63,57	38,14	538,66

Table 57 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 6 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	26,65	18,38	23,33	17,65	5,52	0.	15,87	5,89	21,43	15,86	11,95	162,53
1961	0.	23,77	23,95	22,20	20,44	5,83	0.	20,82	8,46	13,07	20,89	6,27	165,71
1962	0.	27,10	22,61	22,20	19,20	8,41	0.	14,46	16,82	9,75	18,96	11,79	171,30
1963	0.	26,80	27,77	29,42	22,30	9,03	0.	19,09	6,00	13,07	12,43	10,93	176,85
1964	0.	27,03	30,66	20,96	19,20	10,38	0.	20,90	10,18	20,14	10,93	10,61	180,98
1965	0.	25,29	19,41	16,93	22,30	9,08	0.	15,71	10,61	11,25	15,86	5,68	152,12
1966	0.	20,74	18,79	25,60	16,10	5,47	0.	15,71	12,96	15,54	19,61	6,75	157,28
1967	0.	26,95	27,05	19,92	15,38	3,30	0.	16,34	12,75	11,04	18,00	12,86	163,60
1968	0.	25,66	24,78	26,33	19,10	6,19	0.	20,19	10,18	16,39	25,93	10,07	184,83
1969	0.	25,51	24,05	24,67	21,89	4,59	0.	13,20	16,39	10,82	11,68	12,54	165,35
1970	0.	27,18	24,36	23,02	16,62	7,54	0.	14,85	10,50	9,21	16,50	9,86	159,64
1971	0.	15,29	24,05	30,97	16,00	4,85	0.	18,78	8,79	14,14	12,43	6,11	151,42
1972	0.	23,39	29,11	20,54	24,16	9,19	0.	16,11	0.	13,50	11,36	9,80	157,16
1973	0.	26,80	25,50	12,39	18,79	8,26	0.	16,11	14,89	11,46	18,54	7,39	160,13
1974	0.	26,72	22,30	19,00	12,18	7,54	0.	13,36	0,75	18,86	14,36	12,64	147,81
1975	0.	20,67	22,92	25,19	17,96	9,65	0.	20,04	12,11	14,79	13,71	7,07	164,11
1976	0.	25,51	22,51	20,75	16,00	7,02	0.	19,72	9,00	10,71	16,61	10,98	158,82
1977	0.	26,06	30,56	28,80	19,10	7,12	0.	13,51	9,75	11,14	25,61	12,38	184,02
1978	0.	27,10	20,23	25,29	19,31	4,54	0.	19,25	10,61	15,86	20,36	11,20	173,75
1979	0.	24,53	28,49	19,61	23,12	6,40	0.	16,34	13,82	16,29	13,29	12,86	174,85
AVERAGE	0.	24,95	24,37	22,85	18,84	7,00	0.	17,02	10,02	13,92	16,65	9,99	165,61

Table 58 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 7 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	5,25	2,66	3,37	2,55	0,80	0.	4,37	1,19	4,32	3,20	2,41	30,13
1961	0.	4,69	3,46	3,21	2,96	0,84	0.	5,73	1,71	2,64	4,22	1,26	30,71
1962	0.	5,34	3,27	3,21	2,78	1,22	0.	3,98	3,39	1,97	3,83	2,38	31,36
1963	0.	5,28	4,02	4,25	3,22	1,31	0.	5,25	1,21	2,64	2,51	2,21	31,90
1964	0.	5,33	4,43	3,03	2,78	1,50	0.	5,75	2,05	4,06	2,21	2,14	33,28
1965	0.	4,99	2,81	2,45	3,22	1,31	0.	4,32	2,14	2,27	3,20	1,15	27,86
1966	0.	4,09	2,72	3,70	2,33	0,79	0.	4,32	2,62	3,13	3,96	1,36	29,02
1967	0.	5,31	3,91	2,88	2,22	0,48	0.	4,50	2,57	2,23	3,63	2,59	30,33
1968	0.	5,06	3,58	3,81	2,76	0,90	0.	5,56	2,05	3,31	5,23	2,03	34,29
1969	0.	5,03	3,48	3,57	3,16	0,66	0.	3,63	3,31	2,18	2,36	2,53	29,91
1970	0.	5,36	3,52	3,33	2,40	1,09	0.	4,09	2,12	1,86	3,33	1,99	29,09
1971	0.	3,02	3,48	4,48	2,31	0,70	0.	5,17	1,77	2,85	2,51	1,23	27,52
1972	0.	4,61	4,21	2,97	3,49	1,33	0.	4,43	0.	2,72	2,29	1,98	28,04
1973	0.	5,28	3,69	1,79	2,72	1,19	0.	4,43	3,00	2,31	3,74	1,49	29,65
1974	0.	5,27	3,22	2,75	1,76	1,10	0.	3,68	0,15	3,80	2,90	2,55	27,19
1975	0.	4,08	3,31	3,64	2,60	1,40	0.	5,51	2,44	2,98	2,77	1,43	30,16
1976	0.	5,03	3,25	3,00	2,31	1,02	0.	5,43	1,82	2,16	3,35	2,22	29,58
1977	0.	5,13	4,42	4,16	2,76	1,03	0.	3,72	1,97	2,25	5,17	2,50	33,11
1978	0.	5,34	2,93	3,66	2,79	0,66	0.	5,30	2,14	3,20	4,11	2,26	32,38
1979	0.	4,90	4,12	2,81	3,34	0,93	0.	4,50	2,79	3,29	2,68	2,59	31,94
AVERAGE	0.	4,92	3,52	3,30	2,72	1,01	0.	4,68	2,02	2,81	3,36	2,01	30,37

Table 59 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 8 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,	8,24	4,55	3,86	7,48	3,40	0,	9,35	5,16	3,84	3,70	1,10	50,68
1961	0,	7,42	3,23	4,55	8,70	3,64	0,	10,95	6,37	7,25	5,37	2,22	59,71
1962	0,	9,99	4,42	5,27	6,86	2,79	0,	9,82	7,29	1,81	5,30	2,60	56,14
1963	0,	7,55	4,68	8,57	4,78	3,13	0,	9,64	4,09	4,30	2,10	1,94	50,78
1964	0,	6,33	6,30	5,87	8,04	3,18	0,	10,06	3,34	5,37	5,44	2,61	56,55
1965	0,	8,27	3,92	3,76	8,67	4,29	0,	6,72	3,06	3,02	3,66	2,01	47,38
1966	0,	7,61	4,91	4,19	5,70	2,08	0,	8,61	4,94	5,19	4,80	1,92	49,96
1967	0,	7,68	5,54	5,74	4,98	3,35	0,	9,89	4,82	5,97	2,92	2,58	53,26
1968	0,	10,68	4,19	6,26	6,16	2,21	0,	6,29	5,44	1,39	5,65	1,58	49,86
1969	0,	10,22	5,01	6,16	7,68	2,23	0,	6,72	4,77	3,20	4,02	1,32	51,32
1970	0,	8,74	5,21	5,18	4,91	3,79	0,	11,17	3,81	3,31	3,88	1,65	51,63
1971	0,	7,52	5,70	5,24	8,31	3,91	0,	7,86	5,48	5,33	6,97	1,10	57,42
1972	0,	8,24	5,57	4,05	7,88	3,08	0,	10,60	3,59	3,77	2,53	1,37	50,68
1973	0,	9,66	4,45	3,26	5,18	3,35	0,	7,65	4,20	4,55	4,66	1,92	48,87
1974	0,	7,52	7,25	3,96	5,83	3,25	0,	7,90	4,16	7,79	6,47	2,61	56,74
1975	0,	6,36	4,65	6,86	6,07	2,80	0,	10,56	4,16	6,86	3,95	1,53	53,80
1976	0,	8,90	4,68	5,70	8,80	3,68	0,	9,32	4,66	4,20	4,02	1,96	55,91
1977	0,	7,48	6,89	7,25	5,24	3,38	0,	10,74	5,26	3,95	5,76	1,88	57,84
1978	0,	9,33	5,08	4,09	6,59	3,31	0,	9,78	6,37	3,34	8,88	3,38	59,94
1979	0,	8,44	5,37	4,58	7,32	2,62	0,	10,10	3,09	5,12	4,84	3,82	55,31
AVERAGE	0,	8,31	5,08	5,22	6,76	3,17	0,	9,19	4,69	4,48	4,74	2,06	53,49

Table 60 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 9 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,	12,27	6,77	5,74	11,14	5,06	0,	12,91	7,12	5,30	5,11	1,52	72,95
1961	0,	11,05	4,81	6,77	12,96	5,42	0,	15,12	8,79	10,01	7,41	3,07	85,42
1962	0,	14,87	6,58	7,85	10,21	4,15	0,	13,55	10,06	2,50	7,31	3,58	80,68
1963	0,	11,24	6,97	12,76	7,12	4,66	0,	13,30	5,65	5,94	2,90	2,68	73,22
1964	0,	9,43	9,38	8,74	11,98	4,74	0,	13,89	4,61	7,41	7,51	3,61	81,29
1965	0,	12,32	5,84	5,60	12,91	6,38	0,	9,28	4,22	4,17	5,06	2,77	68,56
1966	0,	11,34	7,31	6,23	3,49	3,09	0,	11,88	6,82	7,17	6,63	2,65	71,62
1967	0,	11,44	8,25	8,54	7,41	4,98	0,	13,65	6,38	8,25	4,03	3,56	76,48
1968	0,	15,91	6,23	9,33	9,18	3,29	0,	8,69	7,51	1,94	7,81	2,18	72,04
1969	0,	15,22	7,46	9,18	11,44	3,31	0,	9,28	6,58	4,42	5,55	1,82	74,25
1970	0,	13,01	7,76	7,71	7,31	5,65	0,	15,41	5,25	4,57	5,35	2,28	74,30
1971	0,	11,19	8,49	7,81	12,37	5,82	0,	10,85	7,56	7,36	9,62	1,52	82,60
1972	0,	12,27	8,30	6,04	11,73	4,59	0,	14,63	4,96	5,20	3,49	1,89	73,10
1973	0,	14,38	6,63	4,86	7,71	4,98	0,	10,55	5,79	6,28	6,43	2,65	70,27
1974	0,	11,19	10,80	5,89	8,69	4,84	0,	10,90	5,74	10,75	8,93	3,61	81,34
1975	0,	9,47	6,92	10,21	9,03	4,17	0,	14,58	5,74	9,47	5,45	2,11	77,17
1976	0,	13,25	6,97	8,49	13,11	5,47	0,	12,86	6,43	5,79	5,55	2,70	80,63
1977	0,	11,14	10,26	10,80	7,81	5,03	0,	14,83	7,27	5,45	7,95	2,60	83,14
1978	0,	13,89	7,56	6,09	9,82	4,93	0,	13,50	8,79	4,61	11,98	4,66	85,84
1979	0,	12,57	8,00	6,82	10,90	3,90	0,	13,94	4,27	7,07	6,68	5,28	79,43
AVERAGE	0,	12,37	7,56	7,77	10,07	4,72	0,	12,68	6,48	6,18	6,54	2,84	77,22

Table 61 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 10 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,	52,22	35,21	47,73	64,51	26,82	0,	92,66	49,27	44,62	38,74	12,71	464,50
1961	0,	44,19	34,97	27,88	69,71	22,21	0,	86,77	56,09	39,05	36,88	19,68	437,43
1962	0,	67,11	25,29	35,45	40,88	24,58	0,	66,94	48,34	50,82	48,65	31,14	439,20
1963	0,	46,08	30,25	60,02	43,48	25,29	0,	87,39	42,46	59,81	18,90	24,48	436,15
1964	0,	48,44	45,61	37,34	69,95	23,04	0,	84,91	48,96	54,23	58,88	21,69	493,05
1965	0,	63,09	47,26	44,19	47,03	26,11	0,	70,35	70,04	50,20	35,33	10,38	463,98
1966	0,	49,39	39,23	39,23	66,40	13,00	0,	88,32	54,85	57,64	37,81	9,76	455,62
1967	0,	56,71	38,05	45,61	50,10	23,75	0,	103,19	43,69	37,19	40,29	28,97	467,55
1968	0,	73,26	38,99	41,35	43,72	18,67	0,	68,80	57,33	60,12	55,47	11,78	469,48
1969	0,	72,31	37,10	60,97	37,81	28,59	0,	75,30	61,67	44,93	37,50	9,14	465,33
1970	0,	72,07	35,68	43,95	45,61	20,80	0,	89,25	49,58	64,46	41,53	19,68	482,61
1971	0,	48,92	55,06	44,66	60,50	30,01	0,	87,70	89,11	65,08	38,74	13,48	513,24
1972	0,	62,86	44,19	43,95	71,37	17,01	0,	103,50	40,29	49,89	49,89	17,04	500,00
1973	0,	65,93	35,92	38,28	42,06	24,22	0,	81,19	64,46	42,76	53,30	19,21	467,34
1974	0,	59,79	51,28	44,19	66,64	29,07	0,	105,67	16,42	76,54	48,34	17,97	515,92
1975	0,	52,46	38,05	44,90	50,33	29,77	0,	101,64	58,24	83,36	44,00	29,90	532,69
1976	0,	75,86	38,05	51,04	61,20	16,42	0,	72,20	56,40	61,36	67,25	21,85	521,63
1977	0,	56,71	60,50	61,44	63,57	20,82	0,	86,77	39,36	49,58	31,61	13,95	490,30
1978	0,	68,29	27,41	26,94	58,37	22,69	0,	92,97	67,67	56,40	53,30	18,28	492,52
1979	0,	50,57	55,06	46,55	61,91	16,42	0,	84,60	30,99	52,06	39,98	20,45	458,40
AVERAGE	0,	59,31	40,66	44,28	55,76	23,24	0,	86,51	51,27	55,01	43,82	18,58	478,46

Table 62 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 16 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,17	0,	4,90	3,27	5,15	3,33	0,66	0,	6,37	3,74	3,99	5,03	39,60
1961	3,07	0,	5,23	2,10	4,39	3,58	1,04	0,	8,12	6,64	5,55	4,54	44,25
1962	2,91	0,	3,75	2,83	2,49	4,17	1,02	0,	7,95	3,33	4,92	6,61	39,97
1963	3,40	0,	5,81	4,31	3,65	3,58	0,92	0,	6,12	3,33	4,35	6,01	41,50
1964	2,86	0,	3,89	1,57	3,97	4,39	0,53	0,	7,21	3,69	5,47	5,11	38,68
1965	3,46	0,	5,48	2,72	4,02	4,40	0,83	0,	7,19	3,53	4,97	4,95	41,55
1966	2,88	0,	5,10	2,52	4,24	4,60	0,77	0,	8,42	3,33	4,48	4,26	40,62
1967	2,20	0,	5,68	3,29	3,82	4,37	0,64	0,	7,38	5,38	4,15	4,84	41,75
1968	3,47	0,	4,18	2,23	3,60	4,42	0,85	0,	6,39	2,71	6,75	4,46	39,08
1969	2,30	0,	4,88	2,56	3,85	2,69	0,84	0,	7,62	4,59	6,23	2,46	37,82
1970	2,62	0,	4,93	3,65	3,38	3,00	0,86	0,	6,04	5,27	4,07	4,21	38,04
1971	1,61	0,	3,65	4,40	5,13	4,04	0,81	0,	6,29	4,35	5,00	4,07	39,36
1972	3,51	0,	6,08	2,39	5,15	3,54	1,02	0,	6,48	4,54	4,59	6,04	43,37
1973	3,10	0,	4,71	2,05	3,31	4,71	1,03	0,	5,93	4,10	5,19	6,39	40,53
1974	3,44	0,	5,37	3,45	3,67	3,27	0,49	0,	4,50	5,63	5,93	5,82	43,79
1975	2,50	0,	4,22	2,94	4,68	4,57	0,65	0,	6,75	4,59	5,36	4,21	40,47
1976	3,54	0,	4,57	2,69	4,29	3,65	0,78	0,	5,82	3,91	3,80	6,86	39,91
1977	3,27	0,	6,27	3,67	4,50	4,42	0,74	0,	7,46	4,84	5,63	6,53	47,32
1978	2,81	0,	4,29	2,49	3,44	4,06	0,73	0,	8,17	4,67	5,06	6,12	41,53
1979	3,20	0,	4,40	2,56	3,25	4,33	0,62	0,	6,56	5,16	4,59	7,60	42,28
AVERAGE	2,97	0,	4,87	2,89	3,99	3,96	0,80	0,	6,94	4,37	5,00	5,31	41,09

Table 63 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 17 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,17	0,	0,34	0,22	0,35	0,23	0,04	0,	0,34	0,20	0,22	0,27	2,38
1961	0,17	0,	0,36	0,14	0,30	0,25	0,06	0,	0,44	0,34	0,30	0,24	2,61
1962	0,16	0,	0,26	0,19	0,17	0,29	0,05	0,	0,43	0,18	0,27	0,36	2,35
1963	0,18	0,	0,40	0,30	0,25	0,25	0,05	0,	0,33	0,18	0,23	0,32	2,49
1964	0,15	0,	0,27	0,11	0,27	0,30	0,03	0,	0,39	0,20	0,29	0,28	2,29
1965	0,19	0,	0,38	0,19	0,28	0,30	0,04	0,	0,39	0,19	0,27	0,27	2,48
1966	0,16	0,	0,35	0,17	0,29	0,32	0,04	0,	0,45	0,18	0,24	0,23	2,43
1967	0,12	0,	0,39	0,23	0,26	0,30	0,03	0,	0,40	0,29	0,22	0,26	2,50
1968	0,19	0,	0,29	0,15	0,25	0,30	0,05	0,	0,34	0,15	0,36	0,24	2,32
1969	0,12	0,	0,33	0,18	0,25	0,18	0,05	0,	0,41	0,25	0,34	0,13	2,24
1970	0,14	0,	0,34	0,25	0,23	0,21	0,05	0,	0,33	0,28	0,22	0,23	2,27
1971	0,09	0,	0,25	0,30	0,35	0,28	0,04	0,	0,34	0,23	0,27	0,22	2,38
1972	0,19	0,	0,42	0,16	0,35	0,24	0,05	0,	0,35	0,25	0,25	0,33	2,59
1973	0,17	0,	0,32	0,14	0,23	0,32	0,06	0,	0,32	0,22	0,28	0,34	2,40
1974	0,19	0,	0,37	0,24	0,25	0,22	0,04	0,	0,35	0,30	0,32	0,31	2,59
1975	0,13	0,	0,29	0,20	0,32	0,31	0,04	0,	0,36	0,25	0,29	0,23	2,42
1976	0,19	0,	0,31	0,18	0,29	0,25	0,04	0,	0,31	0,21	0,20	0,37	2,38
1977	0,18	0,	0,43	0,25	0,31	0,30	0,04	0,	0,40	0,24	0,30	0,35	2,83
1978	0,15	0,	0,29	0,17	0,24	0,28	0,04	0,	0,44	0,25	0,27	0,33	2,47
1979	0,17	0,	0,30	0,18	0,22	0,30	0,03	0,	0,35	0,28	0,25	0,41	2,49
AVERAGE	0,16	0,	0,33	0,20	0,27	0,27	0,04	0,	0,37	0,24	0,27	0,29	2,45

Table 64 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 18 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	9,11	0,	11,65	7,78	12,26	7,91	1,90	0,	18,31	10,76	11,47	14,46	105,81
1961	8,84	0,	12,43	5,00	10,43	8,52	3,00	0,	23,33	19,09	15,95	13,04	119,64
1962	8,37	0,	8,91	6,74	5,91	9,91	2,92	0,	22,86	9,58	14,14	19,01	108,36
1963	9,78	0,	13,82	10,26	8,69	8,52	2,66	0,	17,60	9,58	12,49	17,28	110,70
1964	8,21	0,	9,26	3,74	9,43	10,43	1,52	0,	20,74	10,61	15,71	14,69	104,34
1965	9,94	0,	13,04	6,48	9,56	10,48	2,39	0,	20,66	10,13	14,30	14,22	111,21
1966	8,29	0,	12,13	6,00	10,09	10,94	2,22	0,	24,20	9,58	12,88	12,26	108,60
1967	6,32	0,	13,52	7,83	9,09	10,39	1,63	0,	21,21	15,48	11,94	13,91	111,51
1968	9,98	0,	9,96	5,30	8,56	10,52	2,43	0,	16,38	7,78	19,41	12,88	105,21
1969	6,60	0,	11,61	6,09	8,69	6,39	2,42	0,	21,92	13,20	17,91	7,07	101,90
1970	7,54	0,	11,74	8,69	8,04	7,13	2,46	0,	17,36	15,16	11,71	12,10	101,94
1971	4,64	0,	8,69	10,48	12,22	9,61	2,34	0,	18,07	12,49	14,38	11,71	104,62
1972	10,10	0,	14,48	5,69	12,26	8,43	2,92	0,	18,62	13,12	13,20	17,36	116,18
1973	8,92	0,	11,22	4,87	7,87	11,22	2,97	0,	17,05	11,78	14,93	18,38	109,20
1974	9,90	0,	12,78	8,22	8,74	7,78	1,99	0,	18,70	16,18	17,05	16,73	118,07
1975	7,19	0,	10,04	7,08	11,13	10,87	1,87	0,	19,41	13,20	15,40	12,10	108,20
1976	10,17	0,	10,87	6,39	10,22	8,69	2,24	0,	16,73	11,23	10,92	19,72	107,19
1977	9,39	0,	14,91	8,74	10,69	10,52	2,13	0,	21,45	13,91	16,18	16,78	126,70
1978	8,09	0,	10,22	5,91	8,17	9,65	2,09	0,	23,49	13,43	14,53	17,60	113,19
1979	9,19	0,	10,48	8,09	7,74	10,30	1,79	0,	18,86	14,85	13,20	21,84	114,33
AVERAGE	8,53	0,	11,59	6,86	9,49	9,41	2,30	0,	19,95	12,56	14,39	15,26	110,33

Table 65 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 19 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	15,18	0,	14,86	9,92	15,63	10,09	3,16	0,	30,49	17,93	19,10	24,08	160,44
1961	14,72	0,	15,85	6,38	13,30	10,87	4,99	0,	38,86	31,80	26,56	21,72	185,06
1962	13,94	0,	11,36	8,59	7,54	12,64	4,86	0,	38,08	15,96	23,55	31,67	168,20
1963	16,29	0,	17,63	13,08	11,09	10,87	4,43	0,	29,31	15,96	20,81	28,79	168,25
1964	13,67	0,	11,81	4,77	12,03	13,30	2,52	0,	34,55	17,67	26,17	24,47	160,96
1965	16,55	0,	16,63	8,26	12,20	13,36	3,99	0,	34,41	16,88	23,82	23,68	169,78
1966	13,81	0,	15,47	7,65	12,86	13,97	3,70	0,	40,30	15,96	21,46	20,41	165,60
1967	10,53	0,	17,24	9,98	11,59	13,25	3,05	0,	35,33	25,78	19,89	23,16	169,80
1968	16,62	0,	12,69	6,76	10,92	13,42	4,05	0,	30,62	12,95	32,32	21,46	161,82
1969	10,99	0,	14,80	7,76	11,09	8,15	4,03	0,	36,51	21,98	29,83	11,78	156,93
1970	12,56	0,	14,97	11,09	10,26	9,09	4,10	0,	26,92	25,25	19,50	20,15	155,88
1971	7,72	0,	11,09	13,36	15,58	12,25	3,90	0,	30,10	20,81	23,95	19,50	158,24
1972	16,81	0,	18,46	7,26	15,63	10,75	4,88	0,	31,01	21,85	21,98	28,92	177,55
1973	14,85	0,	14,30	6,21	10,03	14,30	4,95	0,	28,40	19,63	24,86	30,62	168,16
1974	16,49	0,	16,30	10,48	11,14	9,92	3,31	0,	31,14	26,94	28,40	27,87	182,01
1975	11,97	0,	12,81	8,93	14,19	13,86	3,11	0,	32,32	21,98	25,65	20,15	164,97
1976	16,95	0,	13,86	8,15	13,03	11,09	3,73	0,	27,87	18,71	18,19	32,84	164,41
1977	15,64	0,	19,01	11,14	13,64	13,42	3,55	0,	35,72	23,16	26,96	31,27	193,51
1978	13,48	0,	13,03	7,54	10,42	12,31	3,49	0,	39,13	22,38	24,21	29,31	175,28
1979	15,31	0,	13,36	7,76	9,87	13,14	2,98	0,	31,41	24,73	21,98	36,38	176,92
AVERAGE	14,20	0,	14,78	8,75	12,10	12,00	3,84	0,	33,22	20,92	23,96	25,41	169,19

Table 66 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 20 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	5,48	0,	8,73	5,83	9,19	5,93	1,14	0,	11,01	6,48	6,90	8,70	69,40
1961	5,32	0,	9,32	3,75	7,82	6,39	1,80	0,	14,04	11,49	9,60	7,85	77,36
1962	5,03	0,	6,68	5,05	4,43	7,43	1,76	0,	13,76	5,77	8,51	11,44	69,85
1963	5,89	0,	10,36	7,69	6,52	6,39	1,80	0,	10,59	5,77	7,52	10,40	72,71
1964	4,94	0,	6,94	2,80	7,07	7,82	0,91	0,	12,48	6,38	9,45	8,84	67,64
1965	5,98	0,	9,77	4,85	7,17	7,85	1,44	0,	12,43	6,10	8,60	8,56	72,76
1966	4,99	0,	9,09	4,50	7,56	8,21	1,34	0,	14,56	5,77	7,75	7,37	71,14
1967	3,81	0,	10,13	5,86	4,81	7,79	1,10	0,	12,76	9,31	7,19	8,37	73,13
1968	6,00	0,	7,46	3,97	6,42	7,88	1,46	0,	11,06	4,68	11,68	7,75	68,38
1969	3,97	0,	8,70	4,56	6,52	4,79	1,46	0,	13,19	7,94	10,78	4,25	66,16
1970	4,54	0,	8,80	6,52	6,03	5,34	1,48	0,	10,45	9,12	7,04	7,28	66,60
1971	2,79	0,	6,52	7,85	9,16	7,20	1,41	0,	10,87	7,52	8,65	7,04	69,01
1972	6,07	0,	10,85	4,27	9,19	6,32	1,76	0,	11,20	7,89	7,94	10,45	75,95
1973	5,37	0,	8,41	3,65	5,90	8,41	1,79	0,	10,26	7,09	8,98	11,06	70,90
1974	5,96	0,	9,58	6,16	6,55	5,63	1,20	0,	11,25	9,74	10,26	10,07	76,59
1975	4,33	0,	7,53	5,25	8,34	8,15	1,12	0,	11,68	7,94	9,27	7,28	70,87
1976	6,12	0,	8,15	4,79	7,66	6,52	1,35	0,	10,07	6,76	6,57	11,87	69,84
1977	5,65	0,	11,18	6,55	8,02	7,88	1,28	0,	12,91	8,37	9,74	11,30	82,87
1978	4,87	0,	7,66	4,43	6,13	7,23	1,26	0,	14,13	8,08	8,75	10,59	73,13
1979	5,53	0,	7,85	4,56	5,80	7,72	1,08	0,	11,35	8,93	7,94	13,14	73,91
AVERAGE	5,13	0,	8,68	5,14	7,11	7,05	1,39	0,	12,00	7,56	8,66	9,18	71,91

Table 67 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 21 IN 199(

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	18,21	0,	28,15	18,80	29,62	19,12	3,79	0,	36,57	21,50	22,92	28,88	227,5
1961	17,66	0,	30,04	12,08	25,21	20,59	5,99	0,	44,62	38,14	31,86	26,06	254,2
1962	16,72	0,	21,53	16,28	14,28	23,95	5,83	0,	45,68	19,15	28,25	37,99	229,6
1963	19,54	0,	33,40	24,79	21,01	20,59	5,31	0,	35,16	19,15	24,96	34,53	238,4
1964	16,40	0,	22,37	9,03	22,79	25,21	3,03	0,	41,44	21,19	31,39	29,35	222,2
1965	19,80	0,	31,51	15,65	23,11	25,31	4,78	0,	41,28	20,25	28,57	28,41	238,7
1966	16,56	0,	29,31	14,50	24,37	26,47	4,44	0,	45,34	19,15	25,74	24,49	233,3
1967	12,64	0,	32,67	18,91	21,95	25,10	3,66	0,	42,38	30,92	23,86	27,78	239,8
1968	19,93	0,	24,05	12,81	20,69	25,42	4,86	0,	36,73	15,54	38,77	25,74	224,5
1969	13,18	0,	28,04	14,71	21,01	15,44	4,84	0,	43,79	26,37	35,79	14,13	217,3
1970	15,07	0,	28,36	21,01	19,43	17,23	4,91	0,	34,69	30,29	23,39	24,17	218,5
1971	9,26	0,	21,01	25,31	29,52	23,21	4,68	0,	36,10	24,94	28,72	23,39	226,1
1972	20,17	0,	34,98	13,76	29,62	20,38	5,83	0,	37,20	26,21	26,37	34,69	249,2
1973	17,82	0,	27,10	11,76	19,01	27,10	5,94	0,	34,06	23,54	29,82	36,73	232,8
1974	19,78	0,	30,88	19,85	21,11	18,80	3,97	0,	37,36	32,33	34,06	33,43	251,5
1975	14,36	0,	24,26	16,91	26,89	26,26	3,74	0,	38,77	26,37	30,76	24,17	232,5
1976	20,33	0,	26,26	15,44	24,68	21,01	4,47	0,	33,43	22,45	21,82	39,40	229,2
1977	18,76	0,	36,03	21,11	25,84	25,42	4,26	0,	42,85	27,78	32,33	37,51	271,9
1978	16,17	0,	24,68	14,28	19,75	23,32	4,18	0,	46,93	26,84	29,04	35,16	240,3
1979	18,36	0,	25,31	14,71	18,70	24,89	3,58	0,	37,67	29,67	26,37	43,64	242,6
AVERAGE	17,04	0,	28,00	16,59	22,93	22,74	4,60	0,	39,65	25,09	28,74	30,18	236,0

Table 68 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 22 IN 199(

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,30	0,	0,69	0,46	0,73	0,47	0,06	0,	0,60	0,35	0,38	0,48	4,52
1961	0,29	0,	0,74	0,30	0,62	0,51	0,10	0,	0,77	0,63	0,52	0,43	4,90
1962	0,27	0,	0,53	0,40	0,35	0,59	0,10	0,	0,75	0,31	0,46	0,62	4,40
1963	0,32	0,	0,82	0,61	0,52	0,51	0,09	0,	0,58	0,31	0,41	0,57	4,73
1964	0,27	0,	0,55	0,22	0,56	0,62	0,05	0,	0,68	0,35	0,52	0,48	4,30
1965	0,33	0,	0,77	0,38	0,57	0,62	0,08	0,	0,68	0,33	0,47	0,47	4,70
1966	0,27	0,	0,72	0,36	0,60	0,65	0,07	0,	0,80	0,31	0,42	0,40	4,61
1967	0,21	0,	0,80	0,46	0,54	0,62	0,06	0,	0,70	0,51	0,39	0,46	4,75
1968	0,33	0,	0,59	0,31	0,51	0,62	0,08	0,	0,60	0,26	0,64	0,42	4,37
1969	0,22	0,	0,69	0,36	0,52	0,38	0,08	0,	0,72	0,43	0,59	0,23	4,22
1970	0,25	0,	0,70	0,52	0,48	0,42	0,08	0,	0,57	0,50	0,38	0,40	4,29
1971	0,15	0,	0,52	0,62	0,73	0,57	0,08	0,	0,59	0,41	0,47	0,38	4,53
1972	0,33	0,	0,86	0,34	0,73	0,50	0,10	0,	0,61	0,43	0,43	0,57	4,90
1973	0,29	0,	0,67	0,29	0,47	0,67	0,10	0,	0,56	0,39	0,49	0,60	4,52
1974	0,33	0,	0,76	0,49	0,52	0,46	0,07	0,	0,61	0,53	0,56	0,55	4,88
1975	0,24	0,	0,60	0,42	0,66	0,65	0,06	0,	0,64	0,43	0,51	0,40	4,59
1976	0,33	0,	0,65	0,38	0,61	0,52	0,07	0,	0,55	0,37	0,36	0,65	4,48
1977	0,31	0,	0,89	0,52	0,64	0,62	0,07	0,	0,70	0,46	0,53	0,62	5,35
1978	0,27	0,	0,61	0,35	0,49	0,57	0,07	0,	0,77	0,44	0,48	0,56	4,62
1979	0,30	0,	0,62	0,36	0,46	0,61	0,06	0,	0,62	0,49	0,43	0,72	4,65
AVERAGE	0,28	0,	0,69	0,41	0,58	0,58	0,08	0,	0,66	0,41	0,47	0,50	4,62

Table 69 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 23 IN 1990

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.37	0.	0.86	0.57	0.90	0.58	0.08	0.	0.75	0.44	0.47	0.59	5.60
1961	0.36	0.	0.92	0.37	0.77	0.63	0.12	0.	0.95	0.78	0.65	0.53	6.07
1962	0.34	0.	0.66	0.50	0.44	0.73	0.12	0.	0.93	0.39	0.58	0.77	5.65
1963	0.40	0.	1.02	0.76	0.64	0.63	0.11	0.	0.72	0.39	0.51	0.70	5.87
1964	0.33	0.	0.68	0.28	0.69	0.77	0.06	0.	0.84	0.43	0.64	0.60	5.33
1965	0.40	0.	0.96	0.48	0.70	0.77	0.10	0.	0.84	0.41	0.58	0.58	5.83
1966	0.34	0.	0.89	0.44	0.74	0.81	0.09	0.	0.99	0.39	0.52	0.50	5.71
1967	0.26	0.	1.00	0.58	0.67	0.76	0.07	0.	0.86	0.63	0.49	0.57	5.88
1968	0.41	0.	0.73	0.39	0.63	0.77	0.10	0.	0.75	0.32	0.79	0.52	5.61
1969	0.27	0.	0.85	0.45	0.64	0.47	0.10	0.	0.89	0.54	0.73	0.29	5.23
1970	0.31	0.	0.86	0.64	0.59	0.52	0.10	0.	0.71	0.62	0.48	0.49	5.32
1971	0.19	0.	0.64	0.77	0.90	0.71	0.10	0.	0.74	0.51	0.59	0.48	5.61
1972	0.41	0.	1.07	0.42	0.90	0.62	0.12	0.	0.76	0.53	0.54	0.71	6.08
1973	0.36	0.	0.83	0.36	0.58	0.83	0.12	0.	0.69	0.48	0.61	0.75	5.60
1974	0.60	0.	0.94	0.60	0.64	0.57	0.08	0.	0.76	0.66	0.69	0.68	6.06
1975	0.29	0.	0.74	0.52	0.82	0.80	0.08	0.	0.79	0.54	0.63	0.49	5.69
1976	0.41	0.	0.80	0.47	0.75	0.64	0.09	0.	0.68	0.46	0.44	0.80	5.56
1977	0.38	0.	1.10	0.64	0.79	0.77	0.09	0.	0.87	0.57	0.66	0.76	6.64
1978	0.33	0.	0.75	0.44	0.60	0.71	0.09	0.	0.96	0.55	0.59	0.72	5.73
1979	0.37	0.	0.77	0.45	0.57	0.76	0.07	0.	0.77	0.60	0.54	0.89	5.79
AVERAGE	0.35	0.	0.85	0.51	0.70	0.69	0.09	0.	0.81	0.51	0.59	0.62	5.72

Table 70 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 24 IN 1990

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,06	0,	0,	0,	0,	0,	0,06	0,	0,43	0,27	0,13	0,	0,96
1961	0,	0,	0,	0,	0,	0,	0,06	0,	0,43	0,32	0,	0,	0,80
1962	0,04	0,	0,	0,	0,	0,	0,06	0,	0,42	0,33	0,15	0,02	1,01
1963	0,11	0,	0,	0,	0,	0,	0,06	0,	0,46	0,24	0,33	0,12	1,32
1964	0,08	0,	0,	0,	0,	0,	0,04	0,	0,52	0,16	0,11	0,	0,90
1965	0,23	0,	0,	0,	0,	0,	0,03	0,	0,42	0,19	0,14	0,11	1,12
1966	0,05	0,	0,	0,	0,	0,	0,04	0,	0,50	0,14	0,15	0,13	1,01
1967	0,01	0,	0,	0,	0,	0,	0,02	0,	0,42	0,25	0,02	0,	0,73
1968	0,14	0,	0,	0,	0,	0,	0,06	0,	0,41	0,24	0,15	0,01	1,00
1969	0,13	0,	0,	0,	0,	0,	0,05	0,	0,47	0,20	0,28	0,	1,14
1970	0,14	0,	0,	0,	0,	0,	0,03	0,	0,43	0,21	0,22	0,	1,02
1971	0,	0,	0,	0,	0,	0,	0,06	0,	0,34	0,17	0,29	0,	0,86
1972	0,16	0,	0,	0,	0,	0,	0,05	0,	0,45	0,34	0,21	0,03	1,26
1973	0,00	0,	0,	0,	0,	0,	0,05	0,	0,38	0,21	0,10	0,02	0,77
1974	0,23	0,	0,	0,	0,	0,	0,03	0,	0,46	0,34	0,13	0,09	1,29
1975	0,12	0,	0,	0,	0,	0,	0,05	0,	0,39	0,22	0,04	0,22	1,04
1976	0,24	0,	0,	0,	0,	0,	0,05	0,	0,46	0,28	0,30	0,	1,34
1977	0,22	0,	0,	0,	0,	0,	0,03	0,	0,56	0,31	0,02	0,05	1,19
1978	0,18	0,	0,	0,	0,	0,	0,06	0,	0,47	0,22	0,29	0,23	1,45
1979	0,06	0,	0,	0,	0,	0,	0,06	0,	0,53	0,30	0,27	0,	1,22
AVERAGE	0,11	0,	0,	0,	0,	0,	0,05	0,	0,45	0,25	0,17	0,05	1,07

Table 71 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 27 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,16	0,	1,75	1,45	1,24	0,86	0,17	0,	1,20	0,76	0,38	0,	7,97
1961	0,	0,	1,01	0,97	1,07	1,33	0,15	0,	1,19	0,90	0,	0,	6,62
1962	0,12	0,	0,84	1,24	1,44	1,51	0,16	0,	1,17	0,91	0,41	0,04	7,84
1963	0,29	0,	1,67	1,43	1,24	1,39	0,17	0,	1,28	0,67	0,91	0,35	9,41
1964	0,23	0,	1,21	0,90	0,89	0,95	0,11	0,	1,44	0,44	0,30	0,	6,46
1965	0,64	0,	1,76	1,14	0,97	0,88	0,10	0,	1,18	0,53	0,40	0,29	7,89
1966	0,13	0,	1,18	0,83	1,06	1,09	0,11	0,	1,38	0,40	0,41	0,37	6,98
1967	0,04	0,	0,76	0,95	1,11	0,65	0,06	0,	1,16	0,71	0,07	0,	5,49
1968	0,38	0,	1,33	0,80	1,07	0,93	0,16	0,	1,14	0,67	0,41	0,03	6,92
1969	0,36	0,	1,49	1,34	0,98	0,86	0,14	0,	1,32	0,56	0,78	0,	7,84
1970	0,38	0,	1,19	0,69	1,19	0,92	0,09	0,	1,19	0,59	0,60	0,	6,84
1971	0,	0,	1,16	1,27	1,06	0,84	0,17	0,	0,94	0,49	0,81	0,	6,73
1972	0,45	0,	1,75	0,80	1,03	1,15	0,14	0,	1,25	1,00	0,60	0,07	8,24
1973	0,01	0,	1,13	1,01	1,19	1,13	0,14	0,	1,06	0,59	0,28	0,07	6,40
1974	0,65	0,	1,51	0,73	1,13	0,93	0,07	0,	1,28	0,96	0,38	0,25	8,19
1975	0,33	0,	1,54	0,88	0,79	0,87	0,15	0,	1,08	0,62	0,10	0,61	6,98
1976	0,67	0,	1,74	0,77	0,96	0,85	0,15	0,	1,28	0,79	0,83	0,	8,05
1977	0,63	0,	1,79	1,34	1,36	0,93	0,09	0,	1,55	0,86	0,05	0,13	8,71
1978	0,51	0,	1,72	1,34	1,03	0,93	0,15	0,	1,32	0,61	0,82	0,64	9,09
1979	0,17	0,	1,28	1,00	1,53	1,02	0,17	0,	1,48	0,84	0,75	0,	8,24
AVERAGE	0,31	0,	1,39	1,04	1,13	1,00	0,13	0,	1,24	0,70	0,46	0,14	7,55

Table 72 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 28 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,04	0,	0,	0,	0,	0,	0,04	0,	0,27	0,17	0,09	0,	0,61
1961	0,	0,	0,	0,	0,	0,	0,03	0,	0,27	0,20	0,	0,	0,51
1962	0,03	0,	0,	0,	0,	0,	0,04	0,	0,27	0,21	0,09	0,01	0,64
1963	0,07	0,	0,	0,	0,	0,	0,04	0,	0,29	0,15	0,21	0,08	0,83
1964	0,05	0,	0,	0,	0,	0,	0,02	0,	0,33	0,10	0,07	0,	0,57
1965	0,15	0,	0,	0,	0,	0,	0,02	0,	0,27	0,12	0,09	0,07	0,71
1966	0,03	0,	0,	0,	0,	0,	0,02	0,	0,31	0,09	0,09	0,08	0,64
1967	0,01	0,	0,	0,	0,	0,	0,01	0,	0,26	0,16	0,02	0,	0,46
1968	0,09	0,	0,	0,	0,	0,	0,04	0,	0,26	0,15	0,09	0,01	0,63
1969	0,08	0,	0,	0,	0,	0,	0,03	0,	0,30	0,13	0,18	0,	0,72
1970	0,09	0,	0,	0,	0,	0,	0,02	0,	0,27	0,13	0,14	0,	0,65
1971	0,	0,	0,	0,	0,	0,	0,04	0,	0,21	0,11	0,18	0,	0,55
1972	0,10	0,	0,	0,	0,	0,	0,03	0,	0,28	0,23	0,14	0,02	0,80
1973	0,00	0,	0,	0,	0,	0,	0,03	0,	0,24	0,13	0,06	0,02	0,49
1974	0,15	0,	0,	0,	0,	0,	0,02	0,	0,29	0,22	0,09	0,06	0,82
1975	0,08	0,	0,	0,	0,	0,	0,03	0,	0,24	0,14	0,02	0,14	0,66
1976	0,15	0,	0,	0,	0,	0,	0,03	0,	0,29	0,18	0,19	0,	0,85
1977	0,14	0,	0,	0,	0,	0,	0,02	0,	0,35	0,20	0,01	0,03	0,75
1978	0,12	0,	0,	0,	0,	0,	0,04	0,	0,30	0,14	0,19	0,15	0,92
1979	0,04	0,	0,	0,	0,	0,	0,04	0,	0,33	0,19	0,17	0,	0,77
AVERAGE	0,07	0,	0,	0,	0,	0,	0,03	0,	0,28	0,14	0,11	0,03	0,68

Table 73 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 29 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,45	0,	0,	0,	0,	0,	0,49	0,	3,44	2,18	1,07	0,	7,64
1961	0,	0,	0,	0,	0,	0,	0,44	0,	3,40	2,56	0,	0,	6,40
1962	0,34	0,	0,	0,	0,	0,	0,46	0,	3,35	2,61	1,17	0,13	8,05
1963	0,84	0,	0,	0,	0,	0,	0,50	0,	3,67	1,93	2,59	1,00	10,51
1964	0,65	0,	0,	0,	0,	0,	0,30	0,	4,12	1,25	0,85	0,	7,18
1965	1,83	0,	0,	0,	0,	0,	0,28	0,	3,37	1,52	1,14	0,84	8,97
1966	0,36	0,	0,	0,	0,	0,	0,30	0,	3,95	1,15	1,19	1,06	8,01
1967	0,10	0,	0,	0,	0,	0,	0,16	0,	3,32	2,02	0,19	0,	5,79
1968	1,08	0,	0,	0,	0,	0,	0,45	0,	3,27	1,91	1,19	0,08	7,98
1969	1,04	0,	0,	0,	0,	0,	0,40	0,	3,78	1,61	2,24	0,	9,07
1970	1,10	0,	0,	0,	0,	0,	0,25	0,	3,40	1,67	1,72	0,	8,14
1971	0,	0,	0,	0,	0,	0,	0,49	0,	2,69	1,39	2,31	0,	6,87
1972	1,29	0,	0,	0,	0,	0,	0,41	0,	3,57	2,86	1,71	0,21	10,04
1973	0,03	0,	0,	0,	0,	0,	0,39	0,	3,02	1,69	0,81	0,19	6,12
1974	1,86	0,	0,	0,	0,	0,	0,21	0,	3,67	2,75	1,07	0,71	10,28
1975	0,95	0,	0,	0,	0,	0,	0,42	0,	3,08	1,79	0,28	1,74	8,26
1976	1,93	0,	0,	0,	0,	0,	0,43	0,	3,67	2,26	2,37	0,	10,65
1977	1,79	0,	0,	0,	0,	0,	0,25	0,	4,44	2,46	0,14	0,38	9,47
1978	1,47	0,	0,	0,	0,	0,	0,44	0,	3,76	1,75	2,34	1,83	11,60
1979	0,50	0,	0,	0,	0,	0,	0,49	0,	4,22	2,40	2,15	0,	9,76
AVERAGE	0,88	0,	0,	0,	0,	0,	0,38	0,	3,56	1,99	1,33	0,41	8,54

Table 74 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 30 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	70,36	7,34	0,	34,32	20,80	37,89	32,84	29,10	25,12	84,05	25,86	55,15	422,83
1961	61,99	11,15	0,	29,42	24,96	31,20	39,67	41,08	26,89	51,34	58,57	56,29	432,57
1962	65,04	10,51	0,	42,94	30,76	32,24	40,27	25,29	31,83	93,18	41,46	68,08	481,59
1963	96,22	11,66	0,	48,73	31,80	38,33	37,89	41,46	28,92	78,73	36,51	54,39	504,64
1964	83,67	7,15	0,	34,02	28,38	25,56	38,19	43,17	33,10	68,46	27,00	65,04	454,62
1965	107,63	11,91	0,	36,40	13,97	40,71	38,48	35,94	29,05	60,47	43,36	60,09	478,02
1966	57,05	11,47	0,	34,92	31,65	36,70	29,12	37,08	28,67	69,60	42,98	69,22	448,45
1967	63,51	2,51	0,	33,13	22,88	42,35	38,04	46,21	27,15	69,22	19,02	55,53	419,54
1968	103,07	14,83	0,	39,37	24,60	36,40	33,13	34,23	38,80	78,73	80,63	67,32	553,11
1969	83,67	13,37	0,	42,20	22,58	27,64	34,92	22,44	38,67	61,23	50,58	61,23	458,54
1970	76,45	13,05	0,	33,13	24,96	33,13	39,52	37,65	27,53	54,77	46,02	30,05	416,26
1971	95,08	10,51	0,	47,10	21,84	36,85	37,29	23,39	37,03	74,16	48,30	12,17	443,73
1972	83,67	7,85	0,	37,44	29,27	31,35	46,51	26,05	24,11	71,88	63,51	50,58	472,23
1973	90,52	12,99	0,	27,34	23,92	28,23	37,15	25,48	31,07	64,28	39,93	50,56	431,49
1974	108,77	7,91	0,	31,80	30,46	35,36	31,95	36,70	31,33	74,54	34,61	71,88	495,31
1975	74,16	7,15	0,	39,23	22,14	29,27	30,76	38,98	29,53	80,63	29,29	62,75	441,88
1976	103,07	14,20	0,	33,43	33,28	33,13	43,83	32,52	33,73	70,36	54,01	55,91	507,47
1977	105,73	8,42	0,	44,72	30,61	29,72	44,57	27,38	30,95	68,08	49,44	73,78	513,41
1978	66,18	12,23	0,	39,97	18,57	39,08	31,20	45,45	33,73	81,39	44,88	59,71	472,39
1979	90,52	12,99	0,	43,98	34,17	30,74	32,24	44,69	29,30	45,24	34,99	103,45	502,35
AVERAGE	84,32	10,46	0,	37,72	24,18	33,79	36,88	34,71	30,72	70,02	43,55	59,16	467,52

Table 75 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 31 IN 199

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	2,78	0,29	0,	0,	0,	0,	0,	1,15	0,99	3,32	1,02	2,18	11,7
1961	2,45	0,44	0,	0,	0,	0,	0,	1,62	1,06	2,03	2,32	2,23	12,1
1962	2,57	0,42	0,	0,	0,	0,	0,	1,00	1,26	3,68	1,64	2,69	13,2
1963	3,80	0,46	0,	0,	0,	0,	0,	1,64	1,14	3,11	1,44	2,15	13,7
1964	3,31	0,28	0,	0,	0,	0,	0,	1,71	1,31	2,71	1,07	2,57	12,9
1965	4,26	0,47	0,	0,	0,	0,	0,	1,42	1,15	2,39	1,71	2,38	13,7
1966	2,26	0,45	0,	0,	0,	0,	0,	1,47	1,13	2,75	1,70	2,74	12,5
1967	2,51	0,10	0,	0,	0,	0,	0,	1,83	1,07	2,14	0,75	2,20	11,1
1968	4,07	0,59	0,	0,	0,	0,	0,	1,35	1,53	3,11	3,19	2,66	16,5
1969	3,31	0,53	0,	0,	0,	0,	0,	0,89	1,53	2,42	2,00	2,42	13,0
1970	3,02	0,52	0,	0,	0,	0,	0,	1,49	1,09	2,17	1,82	1,19	11,2
1971	3,76	0,42	0,	0,	0,	0,	0,	0,92	1,46	2,93	1,91	0,48	11,8
1972	3,31	0,31	0,	0,	0,	0,	0,	1,03	0,95	2,84	2,51	2,00	12,9
1973	3,58	0,51	0,	0,	0,	0,	0,	1,01	1,23	2,54	1,58	2,00	12,4
1974	4,30	0,31	0,	0,	0,	0,	0,	1,45	1,24	2,95	1,37	2,84	14,4
1975	2,93	0,28	0,	0,	0,	0,	0,	1,54	1,09	3,19	1,16	2,48	12,6
1976	4,07	0,56	0,	0,	0,	0,	0,	1,29	1,33	2,78	2,14	2,21	14,3
1977	4,18	0,33	0,	0,	0,	0,	0,	1,08	1,22	2,69	1,95	2,92	14,3
1978	2,62	0,48	0,	0,	0,	0,	0,	1,80	1,33	3,22	1,77	2,36	13,5
1979	3,58	0,51	0,	0,	0,	0,	0,	1,77	1,16	1,79	1,38	4,09	14,2
AVERAGE	3,33	0,41	0,	0,	0,	0,	0,	1,37	1,21	2,77	1,72	2,34	13,1

Table 76 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 32 IN 199

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	2,26	0,24	0,	1,74	1,06	1,92	1,67	0,93	0,81	2,70	0,83	1,77	15,9
1961	1,99	0,36	0,	1,49	1,27	1,58	2,01	1,32	0,86	1,65	1,88	1,81	16,2
1962	2,09	0,34	0,	2,18	1,56	1,64	2,04	0,81	1,02	2,99	1,33	2,18	18,1
1963	3,09	0,37	0,	2,47	1,61	1,95	1,92	1,33	0,93	2,53	1,17	1,74	19,1
1964	2,68	0,23	0,	1,77	1,44	1,30	1,94	1,38	1,06	2,20	0,87	2,09	16,9
1965	3,45	0,38	0,	1,85	0,71	2,07	1,95	1,15	0,93	1,94	1,39	1,93	17,7
1966	1,83	0,37	0,	1,77	1,61	1,86	1,48	1,19	0,92	2,23	1,38	2,22	16,8
1967	2,04	0,08	0,	1,68	1,16	2,15	1,93	1,48	0,87	2,22	0,61	1,78	16,0
1968	3,31	0,48	0,	2,00	1,35	1,85	1,66	1,10	1,24	2,53	2,59	2,16	20,2
1969	2,68	0,43	0,	2,14	1,15	1,40	1,77	0,72	1,24	1,96	1,82	1,96	17,0
1970	2,45	0,42	0,	1,68	1,27	1,68	2,01	1,21	0,88	1,76	1,48	0,96	15,8
1971	3,05	0,34	0,	2,39	1,11	1,87	1,89	0,75	1,19	2,38	1,55	0,39	16,9
1972	2,68	0,25	0,	1,90	1,49	1,59	2,36	0,84	0,77	2,31	2,04	1,62	17,8
1973	2,90	0,42	0,	1,39	1,21	1,43	1,89	0,82	1,00	2,06	1,28	1,62	16,0
1974	3,49	0,25	0,	1,61	1,55	1,80	1,62	1,18	1,00	2,39	1,11	2,31	18,3
1975	2,38	0,23	0,	1,99	1,12	1,49	1,56	1,25	0,88	2,59	0,94	2,01	16,4
1976	3,31	0,46	0,	1,70	1,69	1,68	2,23	1,04	1,08	2,26	1,73	1,79	18,9
1977	3,39	0,27	0,	2,27	1,55	1,51	2,26	0,88	0,99	2,18	1,59	2,37	19,2
1978	2,12	0,39	0,	2,03	0,94	1,98	1,58	1,46	1,08	2,61	1,44	1,92	17,5
1979	2,90	0,42	0,	2,23	1,74	1,56	1,64	1,43	0,94	1,45	1,12	3,32	18,7
AVERAGE	2,70	0,34	0,	1,92	1,33	1,72	1,87	1,11	0,99	2,25	1,40	1,90	17,5

Table 77 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 33 IN 1990

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,54	0,06	0,	0,	0,	0,	0,	0,28	0,19	0,65	0,20	0,43	2,30
1961	0,46	0,09	0,	0,	0,	0,	0,	0,32	0,21	0,40	0,45	0,44	2,38
1962	0,50	0,08	0,	0,	0,	0,	0,	0,20	0,25	0,72	0,32	0,53	2,40
1963	0,75	0,09	0,	0,	0,	0,	0,	0,32	0,22	0,61	0,28	0,42	2,69
1964	0,65	0,06	0,	0,	0,	0,	0,	0,33	0,26	0,53	0,21	0,50	2,54
1965	0,83	0,09	0,	0,	0,	0,	0,	0,28	0,22	0,47	0,34	0,47	2,70
1966	0,44	0,09	0,	0,	0,	0,	0,	0,29	0,22	0,54	0,33	0,54	2,45
1967	0,49	0,02	0,	0,	0,	0,	0,	0,36	0,21	0,54	0,15	0,43	2,19
1968	0,80	0,11	0,	0,	0,	0,	0,	0,27	0,30	0,61	0,62	0,52	3,23
1969	0,65	0,10	0,	0,	0,	0,	0,	0,17	0,30	0,47	0,39	0,47	2,57
1970	0,59	0,10	0,	0,	0,	0,	0,	0,29	0,21	0,42	0,36	0,23	2,21
1971	0,74	0,08	0,	0,	0,	0,	0,	0,18	0,29	0,57	0,37	0,09	2,33
1972	0,65	0,06	0,	0,	0,	0,	0,	0,20	0,19	0,56	0,49	0,39	2,54
1973	0,70	0,10	0,	0,	0,	0,	0,	0,20	0,24	0,50	0,31	0,39	2,44
1974	0,84	0,06	0,	0,	0,	0,	0,	0,28	0,24	0,58	0,27	0,56	2,83
1975	0,57	0,06	0,	0,	0,	0,	0,	0,30	0,21	0,62	0,23	0,49	2,48
1976	0,80	0,11	0,	0,	0,	0,	0,	0,25	0,26	0,54	0,42	0,43	2,82
1977	0,82	0,07	0,	0,	0,	0,	0,	0,21	0,24	0,53	0,38	0,57	2,82
1978	0,51	0,09	0,	0,	0,	0,	0,	0,35	0,26	0,63	0,35	0,46	2,46
1979	0,70	0,10	0,	0,	0,	0,	0,	0,35	0,23	0,35	0,27	0,80	2,80
AVERAGE	0,65	0,08	0,	0,	0,	0,	0,	0,27	0,24	0,54	0,34	0,46	2,58

Table 78 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 34 IN 1990

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	4,31	0,45	0,	2,68	1,63	2,96	2,57	1,78	1,54	5,14	1,58	3,37	28,01
1961	3,79	0,68	0,	2,30	1,95	2,44	3,10	2,51	1,65	3,14	3,58	3,44	28,60
1962	3,98	0,64	0,	3,36	2,40	2,52	3,15	1,55	1,95	5,70	2,54	4,17	31,96
1963	5,89	0,71	0,	3,81	2,49	3,00	2,96	2,54	1,77	4,02	2,23	3,33	33,54
1964	5,12	0,44	0,	2,73	2,22	2,00	2,99	2,64	2,03	4,19	1,65	3,98	29,98
1965	6,59	0,73	0,	2,85	1,09	3,18	3,01	2,20	1,78	3,70	2,65	3,68	31,45
1966	3,49	0,70	0,	2,73	2,47	2,87	2,28	2,27	1,75	4,26	2,63	4,24	29,49
1967	3,89	0,15	0,	2,59	1,79	3,31	2,97	2,03	1,66	4,24	1,16	3,40	27,99
1968	6,31	0,91	0,	3,08	2,08	2,85	2,59	2,09	2,37	4,82	4,93	4,12	36,15
1969	5,12	0,82	0,	3,30	1,77	2,16	2,73	1,37	2,37	3,75	3,10	3,75	30,22
1970	4,68	0,80	0,	2,59	1,95	2,59	3,09	2,30	1,68	3,35	2,82	1,84	27,69
1971	5,82	0,64	0,	3,68	1,71	2,88	2,92	1,43	2,27	4,54	2,96	0,74	29,59
1972	5,12	0,48	0,	2,93	2,29	2,45	3,44	1,59	1,48	4,40	3,89	3,10	31,35
1973	5,54	0,79	0,	2,14	1,87	2,21	2,90	1,56	1,90	3,93	2,44	3,10	28,39
1974	6,66	0,48	0,	2,49	2,38	2,77	2,50	2,25	1,92	4,53	2,12	4,40	32,51
1975	4,54	0,44	0,	3,07	1,73	2,29	2,40	2,30	1,68	4,93	1,79	3,84	29,10
1976	6,31	0,87	0,	2,61	2,60	2,59	3,43	1,99	2,06	4,31	3,30	3,42	33,50
1977	6,47	0,52	0,	3,50	2,39	2,32	3,49	1,68	1,89	4,17	3,03	4,51	33,96
1978	4,05	0,75	0,	3,13	1,45	3,06	2,44	2,78	2,06	4,98	2,75	3,65	31,10
1979	5,54	0,79	0,	3,44	2,67	2,40	2,52	2,73	1,79	2,77	2,14	6,33	33,14
AVERAGE	5,16	0,64	0,	2,95	2,05	2,64	2,88	2,12	1,88	4,28	2,66	3,62	30,90

Table 79 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 35 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,50	2,64	0.	1,57	3,03	2,34	1,85	1,81	0.	4,55	0.	0,08	21,36
1961	4,88	2,70	0.	1,31	3,13	2,48	2,37	1,91	0.	4,43	0.	0.	23,21
1962	6,00	2,96	0.	2,03	2,80	1,98	1,83	1,33	0.	3,98	1,50	0,55	24,97
1963	3,95	2,84	0.	1,95	3,12	2,11	3,21	2,17	0.	5,63	0.	2,38	27,35
1964	5,75	1,45	0.	1,89	2,53	2,78	2,65	1,88	0.	5,13	1,98	2,03	28,05
1965	7,18	2,15	0.	1,56	2,75	1,70	2,77	1,90	0.	3,65	0.	0.	23,65
1966	2,00	2,43	0.	1,80	1,99	1,82	2,57	2,36	0.	4,10	0,60	0.	19,67
1967	0.	1,71	0.	1,66	2,73	2,00	2,43	2,05	0.	5,25	0.	3,50	21,32
1968	7,05	3,01	0.	2,01	2,30	2,41	2,70	1,83	0.	3,23	2,50	0.	27,03
1969	5,00	2,80	0.	1,85	3,39	1,87	2,68	2,56	0.	5,20	0.	2,93	28,27
1970	4,85	2,84	0.	1,19	3,08	2,95	2,33	2,47	0.	4,75	0,25	0,77	25,47
1971	5,90	2,49	0.	2,04	2,70	3,00	2,64	2,14	0.	4,40	0.	0,50	25,80
1972	6,93	3,04	0.	1,46	3,12	2,82	2,26	1,52	0.	4,68	1,80	1,50	29,12
1973	6,48	2,65	0.	1,69	3,29	1,80	2,08	1,89	0.	3,43	0,03	0.	23,32
1974	7,05	2,50	0.	1,74	2,97	1,70	2,93	2,67	0.	4,18	0,47	0,20	26,40
1975	2,40	2,38	0.	1,94	2,52	1,85	2,88	1,93	0.	4,53	0.	0.	20,43
1976	6,80	3,05	0.	1,85	2,11	2,52	2,33	2,54	0.	5,05	0.	3,13	29,38
1977	6,43	2,69	0.	1,97	2,74	1,97	1,93	1,73	0.	3,85	0.	0,63	23,92
1978	6,35	2,86	0.	2,03	2,83	2,48	2,66	1,73	0.	4,55	0.	3,38	28,86
1979	7,00	3,05	0.	1,49	3,01	2,28	2,04	2,71	0.	3,83	0.	5,13	30,53
AVERAGE	5,27	2,61	0.	1,75	2,81	2,24	2,46	2,06	0.	4,42	0,46	1,33	25,41

Table 80 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 36 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	28,45	21,44	0.	11,95	23,12	17,85	14,15	13,80	0.	36,99	0.	0,61	168,35
1961	39,63	21,95	0.	10,01	23,89	18,89	18,11	14,58	0.	35,97	0.	0.	183,02
1962	48,77	24,08	0.	15,48	21,39	15,09	13,97	10,18	0.	32,31	12,19	4,47	197,95
1963	32,11	23,07	0.	14,84	23,81	16,13	24,50	16,56	0.	45,72	0.	19,51	216,03
1964	46,74	11,79	0.	14,40	19,32	21,22	20,18	14,32	0.	41,66	16,05	16,46	222,15
1965	58,32	17,48	0.	11,86	20,96	12,94	21,13	14,49	0.	29,67	0.	0.	186,85
1966	16,26	19,71	0.	13,76	15,18	13,89	19,58	18,03	0.	33,33	4,88	0.	154,61
1967	0.	13,92	0.	12,64	20,79	15,27	18,54	15,61	0.	42,68	0.	28,45	167,89
1968	57,31	24,49	0.	15,31	17,51	18,37	20,61	13,97	0.	26,22	20,32	0.	214,11
1969	40,64	22,76	0.	14,10	25,88	14,23	20,44	19,49	0.	42,27	0.	23,78	223,60
1970	39,42	23,07	0.	9,06	23,46	22,51	17,77	18,80	0.	38,61	2,03	6,30	201,04
1971	47,96	20,22	0.	15,53	20,61	22,86	20,10	16,30	0.	35,77	0.	4,06	203,41
1972	56,29	24,69	0.	11,17	23,81	21,48	17,25	11,56	0.	38,00	14,63	12,19	231,07
1973	52,63	21,54	0.	12,85	25,10	13,71	15,87	14,40	0.	27,84	0,20	0.	184,16
1974	57,31	20,32	0.	13,24	22,68	12,94	22,34	20,36	0.	33,94	3,86	1,63	208,61
1975	19,51	19,51	0.	14,79	19,23	14,15	21,99	14,75	0.	36,78	0.	0.	160,51
1976	55,28	24,79	0.	14,10	15,13	19,23	17,77	19,41	0.	41,05	0.	25,40	253,16
1977	52,23	21,85	0.	15,01	20,87	15,01	14,75	13,20	0.	31,30	0.	5,08	189,29
1978	51,62	23,27	0.	15,48	21,56	18,89	20,27	15,20	0.	36,99	0.	27,43	228,71
1979	56,90	24,79	0.	11,34	22,94	17,42	15,53	20,70	0.	31,09	0.	41,66	242,38
AVERAGE	42,87	21,23	0.	13,35	21,41	17,10	18,74	15,69	0.	35,91	3,71	10,84	200,85

Table 81 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 37 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	6,67	5,02	0.	2,11	4,07	3,15	2,49	2,43	0.	8,67	0.	0,14	34,75
1961	9,29	5,14	0.	1,76	4,21	3,33	3,19	2,57	0.	8,43	0.	0.	37,92
1962	11,43	5,64	0.	2,73	3,77	2,66	2,46	1,79	0.	7,57	2,86	1,05	41,96
1963	7,52	5,40	0.	2,61	4,20	2,84	4,32	2,92	0.	10,71	0.	4,52	45,05
1964	10,95	2,76	0.	2,54	3,40	3,74	3,56	2,52	0.	9,74	3,76	3,86	46,86
1965	13,67	4,10	0.	2,09	3,69	2,28	3,72	2,55	0.	6,95	0.	0.	39,06
1966	3,81	4,62	0.	2,42	2,68	2,45	3,45	3,18	0.	7,81	1,14	0.	31,55
1967	0.	3,26	0.	2,23	3,66	2,69	3,27	2,75	0.	10,00	0.	6,67	34,53
1968	13,43	5,74	0.	2,70	3,09	3,24	3,63	2,46	0.	6,14	4,76	0.	45,19
1969	9,52	5,33	0.	2,49	4,56	2,51	3,60	3,44	0.	9,90	0.	5,57	46,92
1970	9,24	5,40	0.	1,60	4,13	3,97	3,13	3,31	0.	9,05	0,48	1,48	41,78
1971	11,24	4,74	0.	2,74	3,63	4,03	3,54	2,87	0.	8,38	0.	0,95	42,12
1972	13,19	5,79	0.	1,97	4,20	3,78	3,04	2,04	0.	8,90	3,43	2,86	49,19
1973	12,33	5,05	0.	2,26	4,42	2,42	2,80	2,54	0.	6,52	0,05	0.	38,39
1974	13,43	4,76	0.	2,33	4,00	2,28	3,94	3,59	0.	7,95	0,90	0,38	43,56
1975	4,57	4,52	0.	2,61	3,39	2,49	3,88	2,60	0.	8,62	0.	0.	32,48
1976	12,95	5,81	0.	2,49	2,84	3,39	3,13	3,42	0.	9,62	0.	5,95	49,60
1977	12,24	5,12	0.	2,64	3,68	2,64	2,60	2,33	0.	7,33	0.	1,19	39,77
1978	12,10	5,45	0.	2,73	3,80	3,33	3,57	2,33	0.	8,67	0.	6,43	48,40
1979	13,33	5,81	0.	2,00	4,04	3,07	2,74	3,65	0.	7,29	0.	9,76	51,69
AVERAGE	10,05	4,97	0.	2,35	3,77	3,04	3,30	2,78	0.	8,41	0,87	2,54	42,05

Table 82 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 38 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,70	2,79	0.	2,33	4,52	3,49	2,76	2,70	0.	4,81	0.	0,08	27,17
1961	5,15	2,85	0.	1,96	4,67	3,69	3,54	2,85	0.	4,68	0.	0.	29,38
1962	6,34	3,13	0.	3,03	4,18	2,95	2,73	1,99	0.	4,20	1,59	0,58	30,71
1963	4,17	3,00	0.	2,90	4,65	3,15	4,79	3,24	0.	5,94	0.	2,51	34,35
1964	6,08	1,53	0.	2,81	3,78	4,15	3,94	2,80	0.	5,42	2,09	2,14	34,73
1965	7,58	2,27	0.	2,32	4,10	2,53	4,13	2,83	0.	3,84	0.	0.	29,61
1966	2,11	2,56	0.	2,69	2,97	2,71	3,83	3,52	0.	4,33	0,63	0.	25,36
1967	0.	1,81	0.	2,47	4,06	2,98	3,42	3,05	0.	5,55	0.	3,70	27,24
1968	7,45	3,18	0.	2,99	3,42	3,59	4,03	2,73	0.	3,41	2,64	0.	33,44
1969	5,28	2,96	0.	2,76	5,06	2,78	3,99	3,81	0.	5,49	0.	3,09	35,23
1970	5,13	3,00	0.	1,77	4,58	4,40	3,47	3,67	0.	5,02	0,26	0,82	32,13
1971	6,23	2,63	0.	3,03	4,03	4,47	3,93	3,19	0.	4,65	0.	0,53	32,68
1972	7,32	3,21	0.	2,18	4,65	4,20	3,37	2,26	0.	4,94	1,90	1,59	35,62
1973	6,84	2,80	0.	2,51	4,90	2,68	3,10	2,81	0.	3,62	0,03	0.	29,30
1974	7,45	2,64	0.	2,59	4,43	2,53	4,37	3,98	0.	4,41	0,50	0,21	33,11
1975	2,54	2,51	0.	2,89	3,76	2,76	4,30	2,88	0.	4,78	0.	0.	26,42
1976	7,19	3,22	0.	2,76	3,15	3,76	3,47	3,79	0.	5,34	0.	3,30	35,98
1977	6,79	2,84	0.	2,93	4,08	2,93	2,88	2,58	0.	4,07	0.	0,66	29,76
1978	6,71	3,02	0.	3,03	4,21	3,69	3,96	2,58	0.	4,81	0.	3,57	35,58
1979	7,40	3,22	0.	2,22	4,48	3,40	3,03	4,05	0.	4,04	0.	5,42	37,26
AVERAGE	5,57	2,76	0.	2,61	4,18	3,34	3,66	3,06	0.	4,67	0,48	1,41	31,75

Table 83 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 39 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	4.66	3.51	0.	0.85	1.91	1.74	1.38	1.34	0.	4.44	0.	0.10	19.94
1961	6.49	3.60	0.	0.71	1.98	1.86	1.76	1.42	0.	4.32	0.	0.	22.12
1962	7.99	3.94	0.	1.11	1.77	1.47	1.36	0.99	0.	3.88	2.00	0.73	25.24
1963	5.26	3.78	0.	1.06	1.97	1.57	2.39	1.61	0.	5.49	0.	3.16	26.29
1964	7.66	1.93	0.	1.03	1.59	2.07	1.97	1.39	0.	5.00	2.63	2.70	27.97
1965	9.55	2.86	0.	0.85	1.73	1.26	2.06	1.41	0.	3.56	0.	0.	23.29
1966	2.66	3.23	0.	0.98	1.24	1.35	1.91	1.76	0.	4.00	0.80	0.	17.94
1967	0.	2.28	0.	0.90	1.72	1.49	1.81	1.52	0.	5.13	0.	4.66	19.50
1968	9.39	4.01	0.	1.09	1.44	1.79	2.01	1.36	0.	3.15	3.33	0.	27.57
1969	6.66	3.73	0.	1.01	2.15	1.39	1.99	1.90	0.	5.08	0.	3.90	27.79
1970	6.46	3.78	0.	0.65	1.94	2.19	1.73	1.83	0.	4.64	0.33	1.03	24.58
1971	7.86	3.31	0.	1.11	1.70	2.23	1.96	1.59	0.	4.30	0.	0.67	24.71
1972	9.22	4.04	0.	0.80	1.97	2.09	1.68	1.13	0.	4.57	2.40	2.00	29.89
1973	8.62	3.53	0.	0.92	2.08	1.34	1.55	1.40	0.	3.34	0.03	0.	22.81
1974	9.39	3.33	0.	0.95	1.88	1.26	2.18	1.98	0.	4.08	0.63	0.27	25.93
1975	3.20	3.16	0.	1.06	1.59	1.38	2.14	1.44	0.	4.42	0.	0.	18.38
1976	9.06	4.06	0.	1.01	1.32	1.87	1.73	1.89	0.	4.93	0.	4.16	30.03
1977	8.56	3.58	0.	1.07	1.72	1.46	1.44	1.29	0.	3.76	0.	0.83	23.71
1978	8.46	3.81	0.	1.11	1.78	1.84	1.97	1.29	0.	4.64	0.	4.49	29.19
1979	9.32	4.06	0.	0.81	1.90	1.70	1.51	2.02	0.	3.74	0.	6.82	31.88
AVERAGE	7.02	3.48	0.	0.95	1.77	1.67	1.85	1.53	0.	4.31	0.61	1.78	24.94

Table 84 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 40 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	32.62	24.58	0.	6.47	14.50	13.18	10.44	10.19	0.	31.10	0.	0.70	143.77
1961	45.43	25.16	0.	5.42	15.00	13.94	13.37	10.76	0.	30.24	0.	0.	159.32
1962	55.92	27.61	0.	8.38	13.40	11.14	10.31	7.51	0.	27.17	13.98	5.13	180.54
1963	36.81	26.44	0.	8.03	14.94	11.91	18.08	12.23	0.	38.44	0.	22.13	189.02
1964	53.59	13.51	0.	7.80	12.07	15.66	14.90	10.57	0.	35.02	18.41	18.87	200.40
1965	66.87	20.04	0.	6.42	13.12	9.55	15.60	10.70	0.	24.94	0.	0.	167.24
1966	18.64	22.60	0.	7.45	9.42	10.25	14.45	13.31	0.	28.02	5.59	0.	129.73
1967	0.	15.96	0.	6.84	13.01	11.27	13.69	11.52	0.	35.88	0.	32.62	140.79
1968	65.70	28.07	0.	8.29	10.91	13.56	15.22	10.31	0.	22.04	23.30	0.	197.41
1969	46.60	26.09	0.	7.63	16.27	10.51	15.09	14.39	0.	35.54	0.	27.26	199.37
1970	45.20	26.44	0.	4.90	14.72	16.62	13.12	13.88	0.	32.46	2.33	7.22	176.90
1971	54.98	23.18	0.	8.40	12.90	16.87	14.84	12.03	0.	30.07	0.	4.66	177.94
1972	64.54	28.31	0.	6.05	14.94	15.85	12.73	8.53	0.	31.95	16.77	13.98	213.66
1973	60.34	24.70	0.	6.96	15.77	10.12	11.72	10.63	0.	23.41	0.23	0.	163.88
1974	65.70	23.30	0.	7.17	14.22	9.55	16.49	15.03	0.	28.53	4.43	1.86	186.28
1975	22.37	22.13	0.	8.01	12.02	10.44	16.24	10.89	0.	30.92	0.	0.	133.02
1976	63.37	28.42	0.	7.63	10.03	14.20	13.12	14.33	0.	34.51	0.	29.12	214.74
1977	59.88	25.05	0.	8.12	13.07	11.08	10.89	9.74	0.	26.31	0.	5.82	169.96
1978	59.18	26.68	0.	8.38	13.51	13.94	14.96	9.74	0.	31.10	0.	31.65	208.94
1979	65.23	28.42	0.	6.14	14.39	12.86	11.66	15.28	0.	26.14	0.	47.76	227.70
AVERAGE	49.15	24.33	0.	7.22	13.41	12.63	13.84	11.58	0.	30.19	4.25	12.43	179.03

Table 85 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 41 IN 1990

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	34.18	25.75	0.	9.32	20.90	19.00	15.05	14.68	0.	32.58	0.	0.73	172.19
1961	47.60	26.36	0.	7.81	21.61	20.10	19.27	15.51	0.	31.69	0.	0.	189.94
1962	58.59	28.93	0.	12.08	19.31	16.06	14.87	10.83	0.	28.46	14.65	5.37	209.13
1963	38.57	27.71	0.	11.57	21.53	17.16	26.06	17.62	0.	40.28	0.	23.19	223.69
1964	56.15	14.16	0.	11.24	17.40	22.57	21.67	15.23	0.	36.70	19.28	19.77	233.97
1965	70.06	20.99	0.	9.25	18.91	13.76	22.48	15.42	0.	26.14	0.	0.	197.01
1966	19.53	23.68	0.	10.73	13.58	14.77	20.83	19.18	0.	29.36	5.86	0.	157.52
1967	0.	16.72	0.	9.86	18.75	16.24	19.73	16.61	0.	37.59	0.	34.18	169.68
1968	68.84	29.42	0.	11.94	15.73	19.55	21.93	14.87	0.	23.09	24.41	0.	229.77
1969	48.82	27.34	0.	11.00	23.44	15.14	21.75	20.74	0.	37.23	0.	28.56	234.03
1970	47.36	27.71	0.	7.07	21.22	23.95	18.90	20.00	0.	34.01	2.44	7.57	210.22
1971	57.61	24.29	0.	12.11	18.59	24.32	21.38	17.34	0.	31.51	0.	4.88	212.03
1972	67.62	29.66	0.	8.71	21.53	22.85	18.35	12.30	0.	33.48	17.58	14.65	246.72
1973	63.22	25.88	0.	10.03	22.73	14.59	16.88	15.32	0.	24.52	0.24	0.	193.42
1974	68.84	24.41	0.	10.33	20.50	13.76	25.77	21.66	0.	29.90	4.64	1.95	219.75
1975	23.43	23.19	0.	11.54	17.32	15.05	23.40	15.69	0.	32.40	0.	0.	162.03
1976	66.40	29.78	0.	11.00	14.46	20.46	18.90	20.65	0.	36.16	0.	30.51	248.33
1977	62.74	26.24	0.	11.71	18.83	15.97	15.69	14.04	0.	27.57	0.	6.10	198.89
1978	62.00	27.95	0.	12.08	19.47	20.10	21.56	14.04	0.	32.58	0.	32.95	242.74
1979	68.35	29.78	0.	8.85	20.74	18.54	16.52	22.02	0.	27.39	0.	50.04	262.23
AVERAGE	51.49	25.50	0.	10.41	19.33	18.20	19.94	16.69	0.	31.63	4.45	13.02	210.66

Table 86 IRRIGATION WATER DEMAND FOR TRANS PERAK STAGE IV PROJECT IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	28.17	8.89	14.01	27.46	38.08	41.85	25.07	17.25	15.24	17.72	13.07	14.83	261.62
1961	22.99	6.22	13.95	15.10	41.96	34.96	30.56	15.75	16.54	15.07	12.01	22.78	247.89
1962	25.34	13.83	11.54	19.80	20.62	38.49	36.21	10.73	15.07	20.66	18.72	35.86	266.66
1963	24.72	6.85	12.77	35.11	22.36	39.55	23.19	15.91	13.95	24.92	2.06	28.25	249.64
1964	19.69	7.63	16.60	20.98	42.14	36.20	30.09	15.28	15.18	22.28	24.54	25.07	275.69
1965	39.94	12.50	17.01	25.25	25.01	40.79	40.45	11.60	19.19	20.36	11.12	12.18	275.40
1966	30.05	7.95	15.01	22.16	39.49	21.19	34.02	16.15	16.30	23.89	12.54	11.48	250.22
1967	25.50	10.38	14.71	26.13	27.31	37.25	41.55	19.91	14.18	14.18	13.95	33.37	278.44
1968	32.41	15.87	14.95	23.48	22.54	29.66	38.27	11.20	16.77	25.07	22.60	13.77	266.91
1969	33.19	15.56	14.48	35.70	18.13	44.49	33.23	12.85	17.60	17.86	12.36	10.77	266.22
1970	21.58	15.48	14.13	25.10	23.95	32.84	32.60	16.38	15.30	27.13	14.65	22.78	261.93
1971	27.86	7.79	18.95	25.54	35.08	46.61	35.43	15.99	19.01	27.43	13.07	15.71	288.47
1972	30.52	12.42	16.24	25.10	43.20	27.19	33.70	19.99	13.54	20.22	19.42	19.78	281.32
1973	21.26	13.44	14.18	21.57	21.31	37.96	31.66	14.34	18.13	16.83	21.36	22.25	254.30
1974	30.84	11.40	18.01	25.25	39.67	45.20	38.41	20.54	9.00	32.87	18.54	20.83	310.57
1975	30.05	8.97	14.71	25.69	27.49	46.26	23.34	19.52	16.95	36.11	16.07	34.43	299.59
1976	33.35	16.73	14.71	29.52	35.61	26.31	30.88	12.07	16.60	25.66	29.31	25.25	295.99
1977	22.36	10.38	20.30	35.99	37.37	41.85	32.92	15.75	13.36	20.07	9.00	16.24	275.61
1978	19.07	14.22	12.07	14.51	33.49	35.67	60.14	17.32	18.77	23.31	21.36	21.19	271.11
1979	36.18	8.34	18.95	26.72	36.14	26.31	32.76	15.21	11.77	21.25	13.77	23.66	271.05
AVERAGE	27.75	11.24	15.36	25.31	31.54	36.53	33.24	15.69	15.62	22.64	15.98	21.52	272.63

Table 87 IRRIGATION WATER DEMAND FOR ROMPIN-ENDAU PROJECT (ENDAU RIVER BASIN) IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,84	1,83	16,93	25,94	17,16	10,99	8,53	5,36	12,19	12,88	2,34	0,	118,00
1961	0,	5,83	9,77	17,64	14,08	18,84	7,71	5,21	12,00	15,27	0,	0,	106,35
1962	2,62	9,29	8,10	22,32	20,64	21,85	7,99	3,66	11,81	15,57	2,91	0,	126,77
1963	8,11	6,33	16,23	25,56	17,06	19,86	8,72	4,46	13,06	11,29	11,86	2,74	145,26
1964	6,02	1,47	11,71	16,50	10,79	12,45	5,34	5,29	14,86	7,01	1,29	0,	92,74
1965	19,08	6,83	17,10	20,60	12,19	11,36	4,93	4,13	11,88	8,71	2,71	1,74	121,24
1966	2,89	6,79	11,44	15,36	13,88	14,91	5,34	4,18	14,18	6,42	3,01	3,13	101,52
1967	0,72	1,30	7,35	17,26	14,67	7,53	2,88	4,06	11,69	11,89	0,	0,	79,35
1968	10,81	11,89	12,89	14,78	14,08	12,18	7,85	4,39	11,50	11,19	3,01	0,	114,58
1969	10,37	4,87	14,46	24,03	12,39	10,99	7,03	4,39	13,49	9,30	9,68	0,	121,00
1970	10,98	10,75	11,55	12,78	16,27	12,09	4,38	4,39	12,00	9,70	6,39	0,	111,29
1971	0,	9,11	11,22	22,79	13,88	10,72	8,53	4,43	9,20	7,91	10,07	0,	107,87
1972	13,07	10,57	16,93	14,78	13,28	15,83	7,21	4,66	12,69	17,16	6,29	0,	132,48
1973	0,42	7,33	10,90	18,41	16,17	15,55	6,80	5,65	10,51	9,80	1,07	0,	102,62
1974	19,43	6,24	14,67	13,54	20,45	12,18	3,79	5,09	13,06	16,47	2,34	1,04	128,29
1975	9,33	7,52	14,94	16,21	9,00	11,27	7,44	5,16	10,76	10,60	0,	7,41	109,43
1976	20,12	11,67	16,88	14,31	12,09	10,81	7,58	4,36	13,06	13,38	10,47	0,	134,72
1977	18,64	1,89	17,31	24,03	18,95	12,77	4,43	4,44	16,11	14,67	0,	0,	132,75
1978	15,07	4,33	16,72	24,13	13,38	12,18	7,76	5,11	13,43	10,20	10,27	8,01	140,58
1979	4,37	8,93	12,41	18,22	22,24	13,64	8,63	5,67	15,23	14,28	9,08	0,	132,68
AVERAGE	8,79	6,74	13,48	18,96	15,13	13,57	6,64	4,70	12,64	11,68	4,64	1,20	117,98

Table 88 IRRIGATION WATER DEMAND FOR SAWAH ENDAU PROJECT IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	5,68	2,03	18,78	28,76	19,03	12,19	9,46	7,92	18,02	19,05	3,46	0,	144,40
1961	0,	7,60	10,83	19,57	15,61	20,89	8,55	7,70	17,75	22,58	0,	0,	131,08
1962	3,88	12,49	8,98	24,75	22,89	24,23	8,86	5,42	17,47	23,03	4,30	0,	156,29
1963	11,99	8,30	18,00	28,34	18,92	22,00	9,67	6,59	19,31	16,70	17,54	4,05	181,42
1964	8,90	1,63	12,98	18,30	11,97	13,81	5,92	7,82	21,98	10,37	1,91	0,	115,60
1965	28,21	9,01	18,96	22,84	13,52	12,59	5,47	6,10	17,56	12,87	4,01	2,57	153,73
1966	4,27	8,95	12,69	17,03	15,39	16,54	5,92	6,18	20,97	9,49	4,45	4,63	126,50
1967	1,07	1,44	8,15	19,14	16,27	8,35	3,19	6,01	17,29	17,58	0,	0,	98,48
1968	15,98	16,16	14,30	16,39	15,61	13,50	8,71	6,50	17,01	16,55	4,45	0,	145,16
1969	15,34	6,24	16,03	26,65	13,74	12,19	7,79	6,50	19,95	13,76	14,31	0,	152,50
1970	16,24	14,55	12,80	14,17	18,04	13,40	4,86	6,50	17,75	14,34	9,45	0,	142,11
1971	0,	12,23	12,45	25,27	15,39	11,89	9,46	6,55	13,61	11,70	14,90	0,	133,44
1972	19,33	14,29	18,78	16,39	14,73	17,55	8,00	6,89	18,76	25,38	9,31	0,	169,40
1973	0,63	9,72	12,09	20,41	17,93	17,25	7,54	8,36	15,54	14,49	1,58	0,	125,54
1974	28,73	8,18	16,27	15,02	22,67	13,50	4,20	7,53	19,31	24,35	3,46	1,54	164,76
1975	13,79	9,98	16,57	17,98	9,98	12,49	8,25	7,62	15,91	15,37	0,	10,96	138,92
1976	29,76	15,83	18,72	15,87	13,40	11,99	8,40	6,45	19,31	19,79	15,49	0,	175,00
1977	27,57	2,10	19,20	26,65	21,02	13,61	4,91	6,57	23,82	21,70	0,	0,	167,13
1978	22,29	5,47	18,54	26,75	14,84	13,50	8,60	7,55	19,86	15,08	15,19	11,84	179,53
1979	6,46	11,97	13,76	20,20	24,66	15,12	9,57	8,39	22,53	21,11	13,43	0,	167,19
AVERAGE	13,01	8,91	14,94	21,02	16,78	14,83	7,37	6,96	18,69	17,27	6,86	1,78	148,41

Table 89 IRRIGATION WATER DEMAND FOR TRANS PAHANG PROJECT IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	44,92	4,68	0,	30,59	18,54	33,77	29,27	18,57	16,04	53,66	16,51	35,21	301,76
1961	39,58	7,12	0,	26,22	22,25	27,81	35,36	26,22	17,17	32,78	37,39	35,93	307,83
1962	41,52	6,71	0,	38,27	27,41	28,74	35,89	16,15	20,32	59,49	26,47	43,46	344,43
1963	61,43	7,44	0,	43,44	28,34	34,17	33,77	26,47	18,46	50,26	23,31	34,72	361,81
1964	53,42	4,56	0,	31,12	25,30	22,78	34,04	27,56	21,13	43,70	17,24	41,52	322,36
1965	68,71	7,60	0,	32,45	12,45	36,29	34,30	22,94	18,54	38,61	27,68	38,36	337,94
1966	36,42	7,32	0,	31,12	28,21	32,71	25,96	23,67	18,30	44,43	27,44	44,19	319,77
1967	40,55	1,60	0,	29,53	20,40	37,74	33,90	29,50	17,33	44,19	12,14	35,45	302,34
1968	65,80	9,47	0,	35,10	23,71	32,45	29,53	21,85	24,77	50,26	51,47	42,98	387,38
1969	53,42	8,54	0,	37,81	20,13	24,63	31,12	14,33	24,69	39,09	32,29	39,09	324,94
1970	48,80	8,33	0,	29,53	22,25	29,53	35,23	24,04	17,57	34,96	29,38	19,18	298,81
1971	60,70	6,71	0,	41,98	19,47	32,84	33,74	14,93	23,66	47,35	30,84	7,77	319,47
1972	53,42	5,01	0,	33,37	26,09	27,94	41,45	16,63	15,39	45,89	40,55	32,29	338,04
1973	57,79	8,29	0,	24,37	21,32	25,16	33,11	16,27	19,84	41,03	25,49	32,29	304,97
1974	69,44	5,05	0,	28,34	27,15	31,52	28,47	23,43	20,00	47,59	22,09	45,89	348,98
1975	47,35	4,56	0,	34,96	19,73	26,09	27,41	24,89	17,57	51,47	18,70	40,06	312,80
1976	65,80	9,06	0,	29,80	29,67	29,53	39,07	20,76	21,53	44,92	34,48	35,69	360,31
1977	67,50	5,37	0,	39,86	27,28	26,49	39,73	17,48	19,76	43,46	31,56	47,10	365,60
1978	42,25	7,81	0,	35,63	16,55	34,83	27,81	29,01	21,53	51,96	28,65	38,12	334,15
1979	57,79	8,29	0,	39,20	30,46	27,41	28,74	28,53	18,71	28,89	22,34	66,06	356,40
AVERAGE	53,83	6,68	0,	33,63	23,34	30,12	32,87	22,16	19,61	44,70	27,80	37,77	332,50

Table 90 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 1 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0,	15,54	7,86	9,98	7,55	2,36	0,	49,05	13,36	48,56	35,94	27,07	217,26
1961	0,	13,86	10,24	9,49	8,74	2,49	0,	64,35	19,18	29,62	47,35	14,20	219,54
1962	0,	15,80	9,67	9,49	8,21	3,60	0,	44,68	38,12	22,10	42,98	26,71	221,36
1963	0,	15,63	11,88	12,58	9,54	3,86	0,	59,00	13,60	29,62	28,17	24,77	208,44
1964	0,	15,76	13,11	8,96	8,21	4,44	0,	64,59	23,07	45,65	24,77	24,04	232,59
1965	0,	14,74	8,30	7,24	9,54	3,68	0,	48,56	24,04	25,50	35,94	12,87	190,41
1966	0,	12,10	8,03	10,95	6,89	2,34	0,	48,56	29,38	35,21	44,44	15,30	213,19
1967	0,	15,72	11,57	8,52	6,58	1,41	0,	50,51	28,90	25,01	40,79	29,14	218,14
1968	0,	14,97	10,59	11,26	8,17	2,65	0,	62,40	23,07	37,15	58,76	22,82	251,84
1969	0,	14,88	10,29	10,55	9,36	1,96	0,	40,79	37,15	24,52	26,47	28,41	204,38
1970	0,	15,85	10,42	9,84	7,11	3,22	0,	45,89	23,80	20,88	37,39	22,34	196,75
1971	0,	8,92	10,29	13,24	6,84	2,07	0,	58,03	19,91	32,05	28,17	13,84	193,37
1972	0,	13,64	12,45	8,78	10,33	3,93	0,	49,78	0,	30,60	25,74	22,22	177,46
1973	0,	15,63	10,90	5,30	8,03	3,53	0,	49,78	33,75	25,98	42,01	16,75	211,67
1974	0,	15,58	9,54	8,12	5,21	3,27	0,	41,28	1,70	42,74	32,54	28,63	188,62
1975	0,	12,05	9,80	10,77	7,48	4,13	0,	61,92	27,44	33,51	31,08	16,03	214,41
1976	0,	14,88	9,42	8,87	6,84	3,00	0,	60,95	20,40	24,28	37,64	24,89	211,37
1977	0,	15,19	13,07	12,32	8,17	3,05	0,	41,76	22,10	25,25	58,03	28,05	224,98
1978	0,	15,80	8,65	10,82	8,26	1,94	0,	59,49	24,04	35,94	46,14	25,37	236,45
1979	0,	14,48	12,18	8,30	9,89	2,74	0,	50,51	31,32	36,91	30,11	29,14	225,55
AVERAGE	0,	14,55	10,42	9,77	8,06	2,99	0,	52,59	22,72	31,55	37,72	22,63	213,81

Table 91 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 3 IN 2000

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	16,08	11,09	14,08	10,65	3,33	0.	35,01	13,00	47,27	34,98	26,35	211,85
1961	0.	14,34	14,45	13,39	12,33	3,52	0.	45,93	18,67	28,84	46,09	13,83	211,40
1962	0.	16,35	13,64	13,39	11,59	5,08	0.	31,89	37,11	21,51	41,84	26,00	218,40
1963	0.	16,17	16,76	17,75	13,45	5,45	0.	42,12	13,24	28,84	27,42	24,11	205,31
1964	0.	16,31	18,50	12,65	11,59	6,26	0.	46,11	22,45	44,44	24,11	23,40	225,81
1965	0.	15,26	11,71	10,22	13,45	5,48	0.	34,67	23,40	24,82	34,98	12,53	186,51
1966	0.	12,52	11,34	15,45	9,72	3,30	0.	34,67	28,60	34,27	43,25	14,89	208,01
1967	0.	16,26	16,32	12,02	9,28	1,99	0.	36,05	28,13	24,35	39,71	28,36	212,48
1968	0.	15,49	14,95	15,88	11,52	3,74	0.	44,55	22,45	36,16	57,20	22,22	244,16
1969	0.	15,39	14,51	14,89	13,21	2,77	0.	29,12	36,16	23,87	25,76	27,65	203,35
1970	0.	16,40	14,70	13,89	10,03	4,55	0.	32,26	23,16	20,33	36,40	21,75	193,96
1971	0.	9,23	14,51	18,69	9,66	2,93	0.	41,43	19,38	31,20	27,42	13,47	187,91
1972	0.	14,12	17,57	12,40	14,58	5,54	0.	35,53	0.	29,78	25,05	21,63	176,19
1973	0.	16,17	15,39	7,47	11,34	4,98	0.	35,53	32,85	25,29	40,89	16,31	206,23
1974	0.	16,13	13,45	11,46	7,35	4,61	0.	29,47	1,65	41,60	31,67	27,89	185,29
1975	0.	12,47	13,83	15,20	10,84	5,82	0.	44,20	26,71	32,62	30,25	15,60	207,54
1976	0.	15,39	13,58	12,52	9,66	4,24	0.	43,51	19,85	23,64	36,64	24,23	203,25
1977	0.	15,71	18,44	17,38	11,52	4,30	0.	29,81	21,51	24,58	56,49	27,30	227,05
1978	0.	16,35	12,21	15,26	11,65	2,74	0.	42,47	23,40	34,98	44,91	24,70	228,67
1979	0.	14,98	17,19	11,71	13,95	3,86	0.	36,05	30,49	35,93	29,31	28,36	221,85
AVERAGE	0.	15,06	14,71	13,78	11,37	4,22	0.	37,54	22,11	30,72	36,72	22,03	208,26

Table 92 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 5 IN 2000

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	109,52	55,38	70,31	53,20	16,65	0.	86,72	23,61	85,84	63,54	47,87	612,66
1961	0.	97,69	72,18	66,89	61,60	17,58	0.	113,77	33,92	52,38	83,72	25,11	624,84
1962	0.	111,38	68,14	66,89	57,87	25,36	0.	78,99	67,40	39,07	75,99	47,22	638,31
1963	0.	110,14	83,69	88,67	67,20	27,22	0.	104,32	24,04	52,38	49,80	43,79	651,26
1964	0.	111,07	92,40	63,16	57,87	31,27	0.	114,20	40,76	80,71	43,79	42,50	677,76
1965	0.	103,92	58,49	51,02	67,20	27,38	0.	85,86	42,50	45,08	63,54	22,75	567,75
1966	0.	85,25	56,63	77,16	48,54	16,49	0.	85,86	51,95	42,25	78,56	27,05	589,73
1967	0.	110,76	81,52	60,05	44,36	9,96	0.	89,30	51,09	44,22	72,12	51,52	616,88
1968	0.	105,47	74,67	79,34	57,56	18,67	0.	110,35	40,78	65,68	103,89	40,36	696,76
1969	0.	104,85	72,49	74,36	65,96	13,85	0.	72,12	65,68	43,36	46,79	50,23	609,70
1970	0.	111,69	73,43	69,38	50,09	22,71	0.	81,14	42,07	36,92	66,11	39,50	593,05
1971	0.	62,85	72,49	93,34	48,22	14,62	0.	102,60	35,20	56,67	49,80	24,47	560,27
1972	0.	96,14	87,74	61,91	72,80	27,69	0.	88,01	0.	54,09	45,51	39,28	573,17
1973	0.	110,14	76,85	37,34	56,63	24,89	0.	88,01	59,67	45,94	74,27	29,62	603,35
1974	0.	109,83	67,20	57,25	36,71	23,02	0.	72,98	3,01	75,56	57,53	50,66	553,75
1975	0.	84,94	69,07	75,92	54,14	29,09	0.	109,47	48,51	59,24	54,95	28,33	613,67
1976	0.	104,85	67,83	62,54	48,22	21,16	0.	107,76	36,06	42,93	66,54	44,00	601,89
1977	0.	107,03	92,09	86,80	57,56	21,47	0.	73,84	39,07	44,65	102,60	49,59	674,70
1978	0.	111,38	60,98	76,23	58,18	13,69	0.	105,18	42,50	63,54	81,57	44,86	658,11
1979	0.	102,05	85,87	58,49	69,69	19,29	0.	89,30	55,38	65,25	53,23	51,52	650,08
AVERAGE	0.	102,55	73,46	68,85	54,78	21,10	0.	92,99	40,16	55,79	66,69	40,01	618,38

Table 93 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 6 IN 2000

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	48,34	24,44	31,04	23,48	7,35	0.	32,51	8,85	32,19	23,82	17,95	249,98
1961	0.	43,12	31,86	29,53	27,19	7,76	0.	42,66	12,72	19,64	31,39	9,42	255,27
1962	0.	49,16	30,07	29,53	25,54	11,19	0.	29,62	25,27	14,65	28,49	17,71	261,23
1963	0.	48,61	36,94	39,14	29,66	12,02	0.	39,11	9,01	19,64	18,67	16,42	269,23
1964	0.	49,03	40,79	27,88	25,54	13,80	0.	42,82	15,29	30,24	16,42	15,94	277,76
1965	0.	45,87	25,82	22,52	29,66	12,08	0.	32,19	15,94	16,90	23,82	8,53	233,34
1966	0.	37,63	24,99	34,06	21,42	7,28	0.	32,19	19,48	23,34	29,46	10,14	239,99
1967	0.	48,89	35,98	26,50	20,46	4,39	0.	33,48	19,15	16,58	27,04	19,32	251,80
1968	0.	46,55	32,96	35,02	25,41	8,24	0.	41,37	15,29	24,63	38,95	15,13	283,55
1969	0.	46,28	32,00	32,82	29,11	6,11	0.	27,04	24,63	16,26	17,55	18,83	250,63
1970	0.	49,30	32,41	30,62	22,11	10,02	0.	30,42	15,77	13,84	24,79	14,81	244,10
1971	0.	27,74	32,00	41,20	21,29	6,45	0.	38,47	13,20	21,25	18,67	9,17	229,44
1972	0.	42,43	38,73	27,33	32,13	12,22	0.	33,00	0.	20,28	17,06	14,73	237,91
1973	0.	48,61	33,92	16,48	24,99	10,99	0.	33,00	22,37	17,22	27,85	11,11	246,54
1974	0.	48,48	29,66	25,27	16,20	10,16	0.	27,36	1,13	28,33	21,57	18,99	227,16
1975	0.	37,49	30,49	33,51	23,89	12,84	0.	41,05	18,19	22,21	20,40	10,62	250,89
1976	0.	46,28	29,94	27,60	21,29	9,34	0.	40,40	13,52	16,10	24,95	16,50	245,91
1977	0.	47,24	40,65	38,31	25,41	9,48	0.	27,69	14,65	16,74	38,47	18,59	277,22
1978	0.	49,14	26,92	33,65	25,68	6,04	0.	39,44	15,94	23,82	30,58	16,82	268,04
1979	0.	45,04	37,90	25,82	30,76	8,51	0.	33,48	20,76	24,47	19,96	19,32	264,03
AVERAGE	0.	45,24	32,42	30,39	25,06	9,31	0.	34,86	15,06	20,92	25,01	15,00	253,30

Table 94 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 7 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	5,57	2,82	3,57	2,70	0,85	0.	4,37	1,19	4,32	3,20	2,41	31,00
1961	0.	4,97	3,67	3,40	3,13	0,89	0.	5,73	1,71	2,64	4,22	1,26	31,62
1962	0.	5,66	3,46	3,40	2,94	1,29	0.	3,98	3,39	1,97	3,83	2,38	32,30
1963	0.	5,60	4,26	4,51	3,42	1,38	0.	5,25	1,21	2,64	2,51	2,21	32,98
1964	0.	5,65	4,70	3,21	2,94	1,59	0.	5,75	2,05	4,06	2,21	2,14	34,30
1965	0.	5,28	2,97	2,59	3,42	1,39	0.	4,32	2,14	2,27	3,20	1,15	28,74
1966	0.	4,33	2,88	3,92	2,47	0,84	0.	4,32	2,62	3,13	3,96	1,36	29,83
1967	0.	5,63	4,14	3,05	2,36	0,51	0.	4,50	2,57	2,23	3,63	2,59	31,21
1968	0.	5,36	3,80	4,03	2,93	0,95	0.	5,56	2,05	3,31	5,23	2,03	35,25
1969	0.	5,33	3,69	3,78	3,35	0,70	0.	3,63	3,31	2,18	2,36	2,53	30,86
1970	0.	5,68	3,73	3,53	2,55	1,15	0.	4,09	2,12	1,84	3,33	1,99	30,02
1971	0.	3,20	3,69	4,75	2,45	0,74	0.	5,17	1,77	2,85	2,51	1,23	28,35
1972	0.	4,89	4,46	3,15	3,70	1,41	0.	4,43	0.	2,72	2,29	1,98	29,03
1973	0.	5,60	3,91	1,90	2,88	1,27	0.	4,43	3,00	2,31	3,74	1,49	30,53
1974	0.	5,58	3,42	2,91	1,87	1,17	0.	3,68	0,15	3,80	2,90	2,55	28,03
1975	0.	4,32	3,51	3,86	2,75	1,48	0.	5,51	2,44	2,98	2,77	1,43	31,05
1976	0.	5,33	3,45	3,18	2,45	1,08	0.	5,43	1,82	2,14	3,35	2,22	30,46
1977	0.	5,44	4,68	4,41	2,93	1,09	0.	3,72	1,97	2,25	5,17	2,50	34,15
1978	0.	5,66	3,10	3,88	2,96	0,70	0.	5,30	2,14	3,20	4,11	2,26	33,30
1979	0.	5,19	4,37	2,97	3,54	0,98	0.	4,50	2,79	3,29	2,68	2,59	32,90
AVERAGE	0.	5,21	3,73	3,50	2,89	1,07	0.	4,68	2,02	2,81	3,36	2,01	31,30

Table 95 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 8 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	0.	8,87	4,90	4,15	8,05	3,65	0.	11,10	6,12	4,56	4,39	1,31	57,09
1961	0.	7,98	3,48	4,90	9,36	3,92	0.	13,00	7,55	8,61	6,37	2,64	67,81
1962	0.	10,75	4,75	5,68	7,38	3,00	0.	11,65	8,65	2,15	6,29	3,08	63,37
1963	0.	8,12	5,04	9,22	5,14	3,37	0.	11,44	4,85	5,11	2,49	2,30	57,08
1964	0.	6,81	6,78	6,31	8,66	3,42	0.	11,94	3,97	6,37	6,46	3,10	63,82
1965	0.	8,90	4,22	4,04	9,33	4,61	0.	7,98	3,63	3,59	4,35	2,38	53,03
1966	0.	8,19	5,29	4,51	4,14	2,23	0.	10,21	5,87	6,16	5,70	2,28	56,57
1967	0.	8,27	5,96	6,17	5,36	3,60	0.	11,73	5,49	7,09	3,46	3,06	60,18
1968	0.	11,49	4,91	6,74	4,63	2,38	0.	7,47	6,46	1,65	6,71	1,88	55,91
1969	0.	11,00	5,39	6,63	8,27	2,39	0.	7,98	5,45	3,80	4,77	1,56	57,44
1970	0.	9,40	5,60	5,57	5,29	4,08	0.	13,25	4,52	3,92	4,60	1,96	58,19
1971	0.	8,09	6,14	5,64	8,94	4,20	0.	9,33	6,50	6,33	6,27	1,31	64,74
1972	0.	8,87	5,99	4,36	8,48	3,32	0.	12,58	4,26	4,47	3,00	1,62	56,95
1973	0.	10,39	4,79	3,51	5,97	3,60	0.	9,07	4,98	5,40	5,53	2,28	55,13
1974	0.	8,09	7,60	4,26	6,28	3,49	0.	9,37	4,94	9,24	7,68	3,10	64,25
1975	0.	6,85	5,00	7,38	6,53	3,02	0.	12,53	4,94	8,14	4,68	1,81	60,88
1976	0.	9,58	5,04	6,14	9,47	3,96	0.	11,06	5,53	4,98	4,77	2,32	62,83
1977	0.	8,05	7,41	7,80	5,64	3,64	0.	12,74	6,95	4,68	6,84	2,24	65,29
1978	0.	10,04	5,46	4,40	7,09	3,57	0.	11,61	7,55	3,97	10,30	4,01	67,99
1979	0.	9,08	5,78	4,93	7,87	2,82	0.	11,98	3,67	6,08	5,74	4,54	62,50
AVERAGE	0.	8,94	5,47	5,62	7,27	3,41	0.	10,90	5,57	5,32	5,62	2,44	60,55

Table 96 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 16 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	3,20	0.	4,90	3,27	5,15	3,33	0,67	0.	6,44	3,78	4,03	5,08	39,85
1961	3,11	0.	5,23	2,10	4,39	3,58	1,05	0.	8,20	6,71	5,61	4,58	44,56
1962	2,94	0.	3,75	2,63	2,49	4,17	1,03	0.	8,04	3,37	4,97	6,68	40,26
1963	3,44	0.	5,81	4,31	3,65	3,58	0,93	0.	6,19	3,37	4,39	6,08	41,75
1964	2,89	0.	3,89	1,57	3,97	4,39	0,53	0.	7,29	3,73	5,52	5,16	38,94
1965	3,49	0.	5,48	2,72	4,02	4,40	0,84	0.	7,26	3,56	5,03	5,00	41,82
1966	2,91	0.	5,10	2,52	4,24	4,60	0,78	0.	8,51	3,37	4,53	4,31	40,87
1967	2,22	0.	5,68	3,29	3,82	4,37	0,44	0.	7,46	5,44	4,20	4,89	42,01
1968	3,51	0.	4,18	2,23	3,60	4,42	0,86	0.	6,46	2,73	6,82	4,53	39,35
1969	2,32	0.	4,86	2,56	3,65	2,69	0,85	0.	7,71	4,64	6,30	2,49	38,08
1970	2,65	0.	4,93	3,05	3,38	3,00	0,86	0.	6,10	5,33	4,12	4,25	38,28
1971	1,63	0.	3,65	4,40	5,13	4,04	0,82	0.	6,35	4,39	5,05	4,12	39,60
1972	3,55	0.	6,08	2,39	5,15	3,54	1,03	0.	6,55	4,61	4,64	6,10	43,65
1973	3,13	0.	4,71	2,05	3,31	4,71	1,04	0.	5,99	4,14	5,25	6,46	40,81
1974	3,48	0.	5,37	3,45	3,67	3,27	0,70	0.	6,57	5,69	5,99	5,88	44,09
1975	2,53	0.	4,22	2,94	4,68	4,57	0,66	0.	6,92	4,64	5,41	4,25	40,72
1976	3,58	0.	4,57	2,69	4,29	3,65	0,79	0.	5,88	3,95	3,84	6,93	40,17
1977	3,30	0.	6,27	3,67	4,50	4,42	0,75	0.	7,54	4,89	5,69	6,60	47,63
1978	2,84	0.	4,29	2,49	3,44	4,06	0,74	0.	8,26	4,72	5,11	6,19	42,13
1979	3,23	0.	4,40	2,56	3,25	4,33	0,63	0.	6,63	5,22	4,64	7,66	42,57
AVERAGE	3,00	0.	4,87	2,89	3,99	3,96	0,81	0.	7,01	4,41	5,06	5,36	41,36

Table 97 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 18 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	9,24	0.	11,65	7,78	12,26	7,91	1,92	0.	18,56	10,91	11,63	14,65	106,51
1961	8,96	0.	12,43	5,00	10,43	8,52	3,04	0.	23,65	19,35	16,17	13,22	120,77
1962	8,48	0.	8,91	6,74	5,91	9,91	2,96	0.	23,17	9,72	14,33	19,27	109,41
1963	9,91	0.	13,82	10,26	8,69	8,52	2,69	0.	17,84	9,72	12,66	17,52	111,64
1964	8,32	0.	9,26	3,74	9,43	10,43	1,54	0.	21,02	10,75	15,93	14,89	105,32
1965	10,07	0.	13,04	6,48	9,56	10,48	2,43	0.	20,94	10,27	14,49	14,41	112,19
1966	8,40	0.	12,13	6,00	10,09	10,96	2,25	0.	24,53	9,72	13,06	12,42	109,55
1967	6,41	0.	13,52	7,83	9,09	10,39	1,86	0.	21,50	15,69	12,10	14,10	112,48
1968	10,11	0.	9,96	5,30	8,56	10,52	2,47	0.	18,43	7,68	19,67	13,06	106,17
1969	6,69	0.	11,41	6,09	8,69	6,39	2,45	0.	22,22	13,38	18,16	7,17	102,84
1970	7,65	0.	11,74	8,69	8,04	7,13	2,49	0.	17,60	15,37	11,87	12,26	102,84
1971	4,70	0.	8,69	10,48	12,22	9,61	2,37	0.	18,32	12,66	14,57	11,87	105,49
1972	10,23	0.	14,48	5,69	12,26	8,43	2,96	0.	18,87	13,30	13,38	17,60	117,21
1973	9,04	0.	11,22	4,87	7,87	11,22	3,01	0.	17,26	11,95	15,13	18,63	110,21
1974	10,03	0.	12,78	8,22	8,74	7,78	2,01	0.	18,95	16,41	17,28	16,96	119,17
1975	7,29	0.	10,04	7,00	11,13	10,87	1,90	0.	19,67	13,38	15,61	12,26	109,14
1976	10,31	0.	10,87	6,39	10,22	8,69	2,27	0.	18,96	11,39	11,07	19,99	108,16
1977	9,52	0.	14,91	8,74	10,69	10,52	2,16	0.	21,74	14,10	16,41	19,03	127,82
1978	8,20	0.	10,22	5,91	8,17	9,65	2,12	0.	23,81	13,62	14,73	17,84	114,28
1979	9,32	0.	10,48	6,09	7,74	10,30	1,82	0.	19,11	15,05	13,38	22,14	115,42
AVERAGE	8,64	0.	11,39	6,86	9,49	9,41	2,34	0.	20,22	12,73	14,58	15,47	111,33

Table 98 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 19 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	15,90	0.	15,45	10,32	16,26	10,49	3,31	0.	31,93	18,77	20,01	25,21	167,65
1961	15,42	0.	16,49	6,63	13,84	11,30	5,23	0.	40,70	33,30	27,82	22,75	193,47
1962	14,59	0.	11,82	8,94	7,84	13,15	5,09	0.	39,88	16,72	24,67	33,16	175,85
1963	17,06	0.	18,33	13,61	11,93	11,30	4,63	0.	30,70	16,72	21,79	30,15	175,82
1964	14,32	0.	12,28	4,96	12,51	13,84	2,64	0.	36,18	18,50	27,41	25,63	168,26
1965	17,34	0.	17,30	8,59	12,68	13,89	4,18	0.	36,04	17,68	24,94	24,80	177,44
1966	14,46	0.	16,09	7,96	13,38	14,53	3,88	0.	42,21	16,72	22,47	21,38	173,06
1967	11,03	0.	17,93	10,38	12,05	13,78	3,19	0.	37,00	27,00	20,83	24,26	177,44
1968	17,40	0.	13,20	7,03	11,36	13,95	4,25	0.	32,87	13,57	33,85	22,47	169,15
1969	11,51	0.	15,39	8,07	11,53	8,48	4,22	0.	38,23	23,02	31,24	12,33	164,04
1970	13,16	0.	15,57	11,53	10,67	9,44	4,29	0.	30,29	26,45	20,42	21,10	162,92
1971	8,09	0.	11,53	13,89	16,20	12,74	4,08	0.	31,52	21,79	25,08	20,42	165,34
1972	17,61	0.	19,20	7,55	16,26	11,18	5,09	0.	32,48	22,89	23,02	30,29	185,57
1973	15,55	0.	14,87	6,46	10,44	14,87	5,18	0.	29,74	20,56	26,04	32,07	175,78
1974	17,27	0.	16,95	10,90	11,59	10,32	3,47	0.	32,61	28,23	29,74	29,19	190,26
1975	12,54	0.	13,32	9,28	14,76	14,41	3,26	0.	33,85	23,02	26,86	21,10	172,41
1976	17,75	0.	14,41	8,48	13,55	11,53	3,90	0.	29,19	19,60	19,05	34,40	171,85
1977	16,38	0.	19,78	11,59	14,18	13,95	3,72	0.	37,41	24,26	28,23	32,75	202,24
1978	14,11	0.	13,55	7,84	10,84	12,80	3,45	0.	40,97	23,43	25,35	30,70	183,25
1979	16,03	0.	13,89	8,07	10,26	13,66	3,12	0.	32,89	25,96	23,02	38,10	184,96
AVERAGE	14,88	0.	15,37	9,10	12,59	12,48	4,02	0.	34,79	21,91	25,09	26,61	176,84

Table 99 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 21 IN 200

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	19,10	0,	29,06	19,41	30,57	19,73	3,97	0,	38,36	22,56	24,04	30,30	237,10
1961	18,52	0,	31,01	12,47	24,02	21,25	6,28	0,	48,90	40,01	33,42	27,33	265,22
1962	17,54	0,	22,23	16,80	14,74	24,72	6,12	0,	47,91	20,09	29,64	39,86	239,44
1963	20,50	0,	34,48	25,59	21,68	21,25	5,57	0,	36,88	20,09	26,18	36,22	248,44
1964	17,21	0,	23,09	9,32	23,53	26,02	3,18	0,	43,47	22,23	32,93	30,79	231,76
1965	20,83	0,	32,53	16,15	23,65	26,13	5,02	0,	43,30	21,24	29,97	29,80	248,82
1966	17,37	0,	30,25	14,96	25,15	27,32	4,66	0,	50,71	20,09	27,00	25,69	243,21
1967	13,25	0,	33,72	19,52	22,66	25,91	3,84	0,	44,46	32,44	25,03	29,14	249,96
1968	20,91	0,	24,83	13,23	21,36	26,24	5,10	0,	38,53	16,30	40,67	27,00	234,17
1969	13,83	0,	28,95	15,18	21,68	15,94	5,07	0,	45,94	27,66	37,54	14,82	226,61
1970	15,81	0,	29,27	21,68	20,06	17,78	5,16	0,	36,39	31,78	24,53	25,36	227,81
1971	9,71	0,	21,68	26,13	30,47	23,94	4,91	0,	37,87	26,18	30,13	24,53	235,58
1972	21,16	0,	36,10	14,20	30,57	21,03	4,12	0,	39,02	27,50	27,66	36,39	259,76
1973	18,69	0,	27,97	12,14	19,62	27,97	4,23	0,	35,73	24,70	31,28	38,53	242,87
1974	20,75	0,	31,87	20,49	21,79	19,44	4,17	0,	39,19	33,92	35,73	35,07	262,39
1975	15,07	0,	25,04	17,46	27,76	27,10	3,92	0,	40,67	27,64	32,27	25,36	242,30
1976	21,32	0,	27,10	15,91	25,48	21,68	4,69	0,	35,07	23,55	22,89	41,33	239,05
1977	19,68	0,	37,19	21,79	24,67	26,24	4,47	0,	44,95	29,14	33,92	39,35	283,40
1978	16,98	0,	25,48	14,74	20,38	24,07	4,39	0,	49,23	28,16	30,46	36,88	250,75
1979	19,26	0,	26,13	15,18	19,30	25,70	3,75	0,	39,52	31,12	27,66	45,77	253,39
AVERAGE	17,87	0,	28,90	17,12	23,67	23,47	4,83	0,	41,81	26,32	30,15	31,98	246,11

Table 100 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 30 IN 200(

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	74,36	7,76	0,	33,83	20,50	37,35	32,37	30,75	26,55	88,83	27,33	58,28	437,92
1961	65,52	11,78	0,	29,00	24,00	30,74	39,10	43,41	28,42	54,29	61,90	59,49	448,26
1962	68,74	11,11	0,	42,33	30,32	31,78	39,49	26,73	33,64	98,48	43,81	71,95	498,58
1963	101,70	12,32	0,	48,04	31,34	37,79	37,35	43,81	30,57	83,21	38,59	57,48	522,18
1964	88,43	7,55	0,	34,42	27,97	25,19	37,64	45,62	34,98	72,35	28,54	68,74	471,44
1965	113,76	12,59	0,	35,88	13,77	40,13	37,93	37,99	30,70	63,91	45,82	63,51	495,98
1966	60,29	12,12	0,	34,42	31,19	36,17	28,71	39,19	30,30	73,54	45,42	73,16	464,53
1967	67,13	2,65	0,	32,68	22,55	41,74	37,49	48,84	28,69	73,14	20,10	58,69	433,70
1968	108,93	15,68	0,	38,81	26,22	35,88	32,66	36,18	41,01	63,21	85,22	71,15	574,93
1969	88,43	14,13	0,	41,59	22,26	27,24	34,42	23,72	40,87	64,72	53,46	64,72	475,56
1970	80,79	13,80	0,	32,66	24,60	32,66	38,96	39,79	29,09	57,88	48,64	31,76	430,63
1971	100,49	11,11	0,	46,43	21,53	36,32	36,76	24,72	39,13	78,38	51,05	12,86	458,79
1972	88,43	8,29	0,	36,91	28,85	30,90	45,84	27,53	25,48	75,97	67,13	53,46	488,80
1973	95,67	13,73	0,	26,95	23,58	27,83	36,81	26,93	32,84	67,93	42,21	53,46	447,74
1974	114,96	8,36	0,	31,34	30,02	34,86	31,49	38,79	33,11	76,78	36,58	75,97	514,26
1975	78,38	7,55	0,	38,66	21,82	28,05	30,32	41,20	29,09	85,22	30,95	66,32	458,38
1976	108,93	15,01	0,	32,95	32,81	32,66	43,20	34,37	35,65	74,34	57,08	59,09	526,11
1977	111,75	8,90	0,	44,08	30,17	29,29	43,94	28,94	32,71	71,95	52,26	77,98	531,96
1978	69,94	12,92	0,	39,40	18,31	38,52	30,76	48,03	35,65	66,02	47,43	63,11	490,09
1979	95,67	13,73	0,	43,35	33,68	30,32	31,78	47,23	30,97	47,83	36,98	109,33	520,88
AVERAGE	89,12	11,05	0,	37,18	25,81	33,34	36,35	36,69	32,47	74,00	46,02	62,53	484,54

Table 101 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 34 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	4,93	0,51	0,	3,47	2,10	3,83	3,32	2,04	1,76	5,89	1,81	3,87	33,55
1961	4,35	0,78	0,	2,97	2,52	3,15	4,01	2,88	1,89	3,60	4,11	3,95	34,21
1962	4,56	0,74	0,	4,34	3,11	3,24	4,07	1,77	2,23	6,53	2,91	4,77	38,30
1963	6,75	0,82	0,	4,93	3,21	3,87	3,83	2,91	2,03	5,52	2,56	3,81	40,24
1964	5,87	0,50	0,	3,53	2,87	2,58	3,86	3,03	2,32	4,80	1,89	4,56	35,81
1965	7,55	0,84	0,	3,68	1,41	4,11	3,89	2,52	2,04	4,24	3,04	4,21	37,53
1966	4,00	0,80	0,	3,53	3,20	3,71	2,94	2,60	2,01	4,88	3,01	4,85	35,55
1967	4,45	0,18	0,	3,35	2,31	4,28	3,84	3,24	1,90	4,85	1,33	3,89	33,44
1968	7,23	1,04	0,	3,98	2,69	3,68	3,35	2,40	2,72	5,52	5,65	4,72	42,98
1969	5,87	0,94	0,	4,27	2,28	2,79	3,53	1,57	2,71	4,29	3,55	4,29	36,10
1970	5,36	0,92	0,	3,35	2,52	3,35	3,99	2,64	1,93	3,84	3,23	2,11	33,24
1971	6,67	0,74	0,	4,76	2,21	3,72	3,77	1,64	2,60	5,20	3,39	0,85	35,55
1972	5,81	0,55	0,	3,78	2,96	3,17	4,70	1,83	1,69	5,04	4,45	3,55	37,59
1973	6,35	0,91	0,	2,76	2,42	2,85	3,75	1,79	2,18	4,51	2,80	3,55	33,87
1974	7,63	0,55	0,	3,21	3,08	3,57	3,23	2,57	2,20	5,23	2,43	5,04	38,75
1975	5,20	0,50	0,	3,96	2,24	2,96	3,11	2,73	1,93	5,65	2,05	4,40	34,75
1976	7,23	1,00	0,	3,38	3,36	3,35	4,43	2,28	2,37	4,93	3,79	3,92	40,04
1977	7,42	0,59	0,	4,52	3,09	3,00	4,51	1,92	2,17	4,77	3,47	5,17	40,64
1978	4,64	0,86	0,	4,04	1,88	3,95	3,15	3,19	2,37	5,71	3,15	4,19	37,12
1979	6,35	0,91	0,	4,45	3,45	3,11	3,26	3,13	2,05	3,17	2,45	7,25	39,60
AVERAGE	5,91	0,73	0,	3,81	2,65	3,42	3,73	2,43	2,15	4,91	3,05	4,15	36,95

Table 102 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 35 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	5.36	4.04	0.	3.40	6.58	5.08	4.03	3.93	0.	6.96	0.	0.11	39.50
1961	7.46	4.13	0.	2.85	6.80	5.38	5.16	4.15	0.	6.77	0.	0.	42.70
1962	9.18	4.53	0.	4.41	6.09	4.30	3.98	2.90	0.	6.08	2.30	0.84	44.61
1963	6.04	4.34	0.	4.27	6.78	4.59	6.98	4.72	0.	8.61	0.	3.63	49.92
1964	8.80	2.22	0.	4.10	5.50	6.04	5.75	4.08	0.	7.84	3.02	3.10	50.45
1965	10.98	3.29	0.	3.38	5.97	3.68	6.02	4.13	0.	5.59	0.	0.	43.03
1966	3.06	3.71	0.	3.92	4.32	3.95	5.58	5.13	0.	6.27	0.92	0.	36.87
1967	0.	2.62	0.	3.60	5.92	4.35	5.28	4.45	0.	8.03	0.	5.36	39.60
1968	10.79	4.61	0.	4.36	4.99	5.23	5.87	3.98	0.	4.93	3.83	0.	48.59
1969	7.65	4.29	0.	4.02	7.37	4.05	5.82	5.55	0.	7.96	0.	4.48	51.18
1970	7.42	4.34	0.	2.58	6.68	6.41	5.06	5.35	0.	7.27	0.38	1.19	46.69
1971	9.03	3.81	0.	4.42	5.87	6.51	5.72	4.64	0.	6.73	0.	0.77	47.50
1972	10.60	4.65	0.	3.18	6.78	6.12	4.91	3.29	0.	7.15	2.75	2.30	51.73
1973	9.91	4.05	0.	3.66	7.15	3.91	4.52	4.10	0.	5.24	0.04	0.	42.58
1974	10.79	3.83	0.	3.77	6.46	3.68	6.36	5.80	0.	6.39	0.73	0.31	48.11
1975	3.67	3.63	0.	4.21	5.48	4.03	6.26	4.20	0.	6.92	0.	0.	38.41
1976	10.41	4.67	0.	4.02	4.59	5.48	5.06	5.53	0.	7.73	0.	4.78	52.26
1977	9.83	4.11	0.	4.27	5.94	4.27	4.20	3.76	0.	5.89	0.	0.96	43.24
1978	9.72	4.38	0.	4.41	6.14	5.38	5.77	3.76	0.	6.96	0.	5.16	51.68
1979	10.71	4.67	0.	3.23	6.53	4.96	4.42	5.90	0.	5.85	0.	7.84	54.12
AVERAGE	8.07	4.00	0.	3.80	6.10	4.87	5.34	4.47	0.	6.76	0.70	2.04	46.14

Table 103 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 36 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	28.45	21.44	0.	13.05	25.25	19.50	15.45	15.07	0.	36.99	0.	0.61	175.80
1961	39.63	21.95	0.	10.93	26.09	20.63	19.78	15.92	0.	35.97	0.	0.	190.90
1962	48.77	24.08	0.	16.91	23.36	16.49	15.26	11.12	0.	32.31	12.19	4.47	204.96
1963	32.11	23.07	0.	16.20	26.00	17.62	20.75	18.09	0.	45.72	0.	19.31	224.86
1964	46.74	11.79	0.	15.73	21.10	23.17	22.04	15.64	0.	41.66	16.05	16.46	230.39
1965	58.32	17.48	0.	12.95	22.89	14.13	23.08	15.83	0.	29.67	0.	0.	194.35
1966	16.26	19.71	0.	15.02	14.58	15.17	21.38	19.69	0.	33.33	4.88	0.	162.02
1967	0.	13.92	0.	13.80	22.70	16.67	20.25	17.05	0.	42.68	0.	28.45	175.53
1968	57.31	24.49	0.	16.72	19.12	20.06	22.51	15.26	0.	26.22	20.32	0.	222.01
1969	40.64	22.76	0.	15.40	28.26	15.54	22.53	21.29	0.	42.27	0.	23.78	232.27
1970	39.42	23.07	0.	9.89	25.62	24.59	19.41	20.54	0.	38.61	2.03	6.30	209.47
1971	47.96	20.22	0.	16.96	22.51	24.96	21.95	17.80	0.	35.77	0.	4.06	212.20
1972	56.29	24.69	0.	12.20	26.00	23.46	18.84	12.62	0.	38.00	14.63	12.19	238.93
1973	52.63	21.54	0.	14.04	27.41	14.98	17.33	15.73	0.	27.84	0.20	0.	191.71
1974	57.31	20.32	0.	14.46	24.77	14.13	24.40	22.23	0.	33.94	3.86	1.63	217.05
1975	19.51	19.31	0.	16.16	21.01	15.45	24.02	16.11	0.	36.78	0.	0.	168.34
1976	55.28	24.79	0.	15.40	17.62	21.01	19.41	21.20	0.	41.05	0.	25.40	241.14
1977	52.23	21.85	0.	16.39	22.80	16.39	16.11	14.41	0.	31.30	0.	5.08	196.55
1978	51.62	23.27	0.	16.91	23.55	20.63	22.14	14.41	0.	36.99	0.	27.43	236.94
1979	56.90	24.79	0.	12.39	25.06	19.03	16.96	22.61	0.	31.09	0.	41.66	250.48
AVERAGE	42.87	21.23	0.	14.58	23.39	18.68	20.47	17.13	0.	35.91	3.71	10.84	208.79

Table 104 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 37 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	8.15	6.14	0.	3.57	6.90	5.33	4.23	4.12	0.	10.59	0.	0.17	49.20
1961	11.35	6.28	0.	2.99	7.14	5.64	5.41	4.35	0.	10.30	0.	0.	53.46
1962	13.96	6.89	0.	4.62	6.39	4.51	4.17	3.04	0.	9.25	3.49	1.28	57.62
1963	9.19	6.60	0.	4.43	7.11	4.82	7.32	4.95	0.	13.09	0.	5.53	63.04
1964	13.38	3.37	0.	4.30	5.77	6.36	6.03	4.28	0.	11.93	4.60	4.71	64.71
1965	16.70	5.00	0.	3.54	6.26	3.86	6.31	4.33	0.	8.49	0.	0.	54.50
1966	4.65	5.64	0.	4.11	4.53	4.15	5.85	5.38	0.	9.36	1.40	0.	45.26
1967	0.	3.99	0.	3.77	6.21	4.56	5.56	4.66	0.	12.22	0.	8.15	49.10
1968	16.41	7.01	0.	4.57	5.23	5.49	6.16	6.17	0.	7.51	5.82	0.	62.36
1969	11.64	6.52	0.	4.21	7.73	4.25	6.11	5.82	0.	12.10	0.	6.81	65.18
1970	11.29	6.60	0.	2.71	7.01	6.72	5.31	5.62	0.	11.05	0.58	1.80	58.69
1971	13.73	5.79	0.	4.64	6.16	6.83	6.00	4.87	0.	10.24	0.	1.16	59.42
1972	16.12	7.07	0.	3.34	7.11	6.42	5.15	3.45	0.	10.88	4.19	3.49	67.21
1973	15.07	6.17	0.	3.84	7.50	4.10	4.74	4.30	0.	7.97	0.06	0.	53.74
1974	16.41	5.82	0.	3.95	6.78	3.86	6.67	6.08	0.	9.72	1.11	0.67	60.86
1975	5.59	5.53	0.	4.42	5.75	4.23	6.57	4.41	0.	10.53	0.	0.	47.01
1976	15.83	7.10	0.	4.21	4.82	5.75	5.31	5.80	0.	11.75	0.	7.27	67.83
1977	14.95	6.25	0.	4.48	6.23	4.48	4.41	3.94	0.	8.96	0.	1.45	55.17
1978	14.78	6.66	0.	4.62	6.44	5.64	6.05	3.94	0.	10.59	0.	7.85	66.59
1979	16.29	7.10	0.	3.39	6.85	5.20	4.64	6.18	0.	8.90	0.	11.93	70.48
AVERAGE	12.27	6.08	0.	3.99	6.40	5.11	5.60	4.69	0.	10.28	1.06	3.10	58.57

Table 105 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 39 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	15.52	11.69	0.	4.33	9.71	8.83	6.99	6.82	0.	14.79	0.	0.35	79.02
1961	21.61	11.97	0.	3.63	10.04	9.34	8.95	7.21	0.	14.39	0.	0.	87.14
1962	26.60	13.13	0.	5.61	8.97	7.46	6.91	5.03	0.	12.92	6.65	2.44	95.73
1963	17.51	12.58	0.	5.38	10.01	7.97	12.11	8.19	0.	18.29	0.	10.53	102.56
1964	25.49	6.43	0.	5.22	8.08	10.69	9.98	7.08	0.	16.66	8.76	8.98	107.17
1965	31.81	9.53	0.	4.30	8.79	6.40	10.45	7.16	0.	11.87	0.	0.	90.30
1966	8.87	10.75	0.	4.99	6.31	6.86	9.68	8.91	0.	13.33	2.66	0.	72.36
1967	0.	7.59	0.	4.58	8.71	7.55	9.17	7.72	0.	17.07	0.	15.52	77.90
1968	31.26	13.36	0.	5.55	7.31	9.08	10.19	6.91	0.	10.49	11.08	0.	105.22
1969	22.17	12.41	0.	5.11	10.89	7.04	10.10	9.64	0.	16.91	0.	12.97	107.23
1970	21.50	12.58	0.	3.28	9.86	11.13	8.78	9.29	0.	15.44	1.11	3.44	96.42
1971	26.16	11.03	0.	5.63	8.64	11.30	9.93	8.06	0.	14.31	0.	2.22	97.26
1972	30.70	13.47	0.	4.05	10.01	10.62	8.53	5.71	0.	15.20	7.98	6.65	112.91
1973	28.71	11.75	0.	4.66	10.56	6.78	7.85	7.12	0.	11.14	0.11	0.	88.66
1974	31.26	11.08	0.	4.80	9.52	6.40	11.04	10.06	0.	13.57	2.11	0.89	100.73
1975	10.64	10.53	0.	5.36	8.05	6.99	10.87	7.29	0.	14.71	0.	0.	74.45
1976	30.15	13.52	0.	5.11	6.72	9.51	8.78	9.59	0.	16.42	0.	13.85	113.66
1977	28.48	11.91	0.	5.44	8.75	7.42	7.29	6.52	0.	12.52	0.	2.77	91.11
1978	28.15	12.69	0.	5.61	9.04	9.34	10.02	6.52	0.	14.79	0.	14.96	111.14
1979	31.03	13.52	0.	4.11	9.64	8.61	7.67	10.23	0.	12.44	0.	22.72	119.98
AVERAGE	23.38	11.58	0.	4.84	8.98	8.45	9.26	7.75	0.	14.36	2.02	5.91	96.55

Table 106 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 40 IN 2000

Unit: 10^6 m^3

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	43.39	32.70	0.	12.11	27.15	24.67	19.55	19.07	0.	41.36	0.	0.93	220.93
1961	60.44	33.47	0.	10.14	28.08	26.10	25.03	20.14	0.	40.23	0.	0.	243.63
1962	74.38	36.73	0.	15.69	25.08	20.86	19.31	14.07	0.	36.14	18.60	6.82	267.67
1963	48.97	35.18	0.	15.04	27.97	22.29	33.85	22.89	0.	51.14	0.	29.44	286.76
1964	71.28	17.98	0.	14.60	22.60	29.32	27.89	19.79	0.	46.59	24.48	25.10	299.64
1965	88.95	26.65	0.	12.02	24.56	17.88	29.20	20.03	0.	33.18	0.	0.	252.48
1966	24.79	30.06	0.	13.94	17.64	19.19	27.06	24.91	0.	37.27	7.44	0.	202.32
1967	0.	21.23	0.	12.81	24.36	21.10	25.63	21.58	0.	47.73	0.	43.39	217.81
1968	87.40	37.35	0.	15.52	20.43	25.39	28.49	19.31	0.	29.32	30.99	0.	294.19
1969	61.99	34.71	0.	14.29	30.45	19.67	28.25	26.94	0.	47.27	0.	36.26	299.83
1970	60.13	35.18	0.	9.18	27.56	31.11	24.56	25.99	0.	43.18	3.10	9.61	269.58
1971	73.14	30.84	0.	15.73	24.15	31.59	27.77	22.53	0.	40.00	0.	6.20	271.96
1972	85.85	37.66	0.	11.32	27.97	29.68	23.84	15.97	0.	42.50	22.31	18.60	315.70
1973	80.27	32.85	0.	13.02	29.52	18.95	21.93	19.91	0.	31.14	0.31	0.	247.91
1974	87.40	30.99	0.	13.42	26.63	17.88	30.87	28.13	0.	37.96	5.89	2.48	281.65
1975	29.75	29.44	0.	14.99	22.50	19.55	30.40	20.38	0.	41.14	0.	0.	208.15
1976	84.30	37.81	0.	14.29	18.78	26.58	24.56	26.82	0.	45.91	0.	38.74	317.79
1977	79.65	33.32	0.	15.21	24.46	20.74	20.38	18.24	0.	35.00	0.	7.75	254.75
1978	78.72	35.49	0.	15.69	25.29	26.10	28.01	18.24	0.	41.36	0.	41.84	310.74
1979	86.78	37.81	0.	11.49	26.94	24.08	21.46	28.61	0.	34.77	0.	63.54	335.48
AVERAGE	65.38	32.37	0.	13.53	25.11	23.64	25.90	21.68	0.	40.16	5.66	16.53	269.95

Table 107 IRRIGATION WATER DEMAND FOR MINOR SCHEMES IN BASIN 41 IN 200

Unit: 10^6 m

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1960	66.81	50.34	0.	21.51	44.92	37.99	30.10	29.36	0.	73.49	0.	1.43	355.95
1961	93.05	51.54	0.	18.01	46.45	40.19	38.54	31.02	0.	71.47	0.	0.	390.26
1962	114.52	56.55	0.	27.87	41.53	32.12	29.73	21.66	0.	64.20	28.63	10.50	427.31
1963	75.39	54.16	0.	26.71	46.28	34.32	52.12	35.24	0.	90.85	0.	45.33	460.40
1964	109.75	27.68	0.	25.93	37.47	45.15	42.95	30.47	0.	82.77	37.70	38.65	478.51
1965	136.95	41.04	0.	21.35	40.69	27.53	44.96	30.83	0.	58.95	0.	0.	402.30
1966	38.17	46.29	0.	24.77	29.34	29.55	41.66	38.36	0.	66.22	11.45	0.	325.80
1967	0.	32.69	0.	22.75	40.35	32.48	39.46	33.22	0.	84.79	0.	66.81	352.54
1968	134.57	57.50	0.	27.56	33.91	39.09	43.86	29.73	0.	52.09	47.22	0.	466.03
1969	95.44	53.44	0.	25.39	50.34	30.28	43.50	41.48	0.	83.98	0.	55.83	479.68
1970	92.57	54.16	0.	16.31	45.60	47.90	37.81	40.01	0.	76.72	4.77	14.79	430.64
1971	112.61	47.48	0.	27.95	40.01	48.63	42.76	34.69	0.	71.06	0.	9.54	434.75
1972	132.18	57.98	0.	20.11	46.28	45.70	36.71	24.59	0.	75.50	34.36	28.63	502.03
1973	123.59	50.58	0.	23.14	48.82	29.18	33.77	30.65	0.	55.32	0.48	0.	395.52
1974	134.37	47.72	0.	23.84	44.07	27.53	47.53	43.31	0.	67.43	9.07	3.82	448.88
1975	45.81	45.33	0.	26.63	37.30	30.10	46.80	31.38	0.	73.08	0.	0.	336.44
1976	129.79	58.22	0.	25.39	31.20	40.93	37.81	41.29	0.	81.56	0.	59.65	505.84
1977	122.64	51.30	0.	27.02	40.52	31.93	31.38	28.08	0.	62.18	0.	11.93	406.98
1978	121.20	54.64	0.	27.87	41.87	40.19	43.33	28.08	0.	73.49	0.	64.42	494.90
1979	133.61	58.22	0.	20.42	44.58	37.07	33.03	44.05	0.	61.78	0.	97.82	530.58
AVERAGE	100.66	49.84	0.	24.03	41.58	36.39	39.88	33.37	0.	71.35	8.71	25.46	431.27

Table 108 ESTIMATED IRRIGATION WATER DEMAND FOR PADDY BY BASIN

Unit: 10^6 m^3/y

Basin No.	Basin Name	Scheme	1980	1990	2000
1	Perlis	Minor	94	189	213
2	P. Langkawi	Minor	44	45	45
3	Kedah	Major	1,911	1,764	1,764
		Minor	25	114	208
4	Merbok+	Minor	37	48	48
5	Muda	Minor	498	539	618
6	Perai+	Minor	183	166	166
7	P. Pinang	Minor	28	30	31
8	Kerian	Minor	31	54	61
9	Kurau+	Major	478	441	441
		Minor	80	77	77
10	Perak	Major	228	454	479
		Minor	501	478	478
11	Bernam	Major	624	567	567
12 - 15	Tengi+	-	-	-	-
16	Langat	Minor	44	41	41
17	Sepang+	Minor	3	3	3
18	Linggi+	Minor	111	110	111
19	Melaka+	Minor	139	169	177
20	Kesang	Minor	72	72	72
21	Muar+	Minor	190	236	246
22	Batu Pahat+	Minor	5	5	5
23	Pontian Kechil	Minor	6	6	6
24	Johor	Minor	1	1	1
25 - 26	Sedili Besar+	-	-	-	-
27	Endau	Major	-	202	266
		Minor	33	8	8
28	Rompin	Mjaor	-	125	125
		Minor	-	1	1
29	Bebar+	Minor	3	9	9
30	Pahang+	Major	-	117	333
		Minor	357	468	485
31	Kuantan+	Minor	8	13	13
32	Kemaman+	Minor	19	18	18
33	Paka	Minor	3	3	3
34	Dungun	Minor	2	31	37
35	Marang+	Minor	13	25	46
36	Trengganu	Minor	180	201	209
37	Setiu+	Minor	29	42	59
38	Besut+	Major	128	116	116
		Minor	23	32	32
39	Kemasin+	Major	-	159	159
		Minor	-	25	97
40	Kelantan	Major	746	678	678
		Minor	106	179	270
41	Golok	Minor	7	211	431
	Total		6,990	8,272	9,253

Table 109 RATIO OF NET IRRIGATION WATER WITHDRAWAL TO GROSS DEMAND FOR MINOR IRRIGATION AREAS

Basin No.	Basin Name	1980	1990	2000
1	Perlis	0.83	0.82	0.81
2	P. Langkawi	0.86	0.86	0.86
3	Kedah	0.80	0.80	0.80
4	Merbok+	0.98	0.98	0.98
5	Muda	0.93	0.93	0.93
6	Perai+	0.92	0.91	0.90
7	P. Pinang	0.97	0.97	0.97
8	Kerian	0.80	0.80	0.80
9	Kurau	0.80	0.80	0.80
10	Perak	0.80	0.80	0.80
11	Bernam	-	-	-
12-15	Tengi+	-	-	-
16	Langat	0.80	0.80	0.80
17	Sepang+	0.80	0.80	0.80
18	Linggi+	0.80	0.80	0.80
19	Melaka+	0.91	0.90	0.89
20	Kesang	0.82	0.82	0.82
21	Huar	0.81	0.81	0.81
22	Batu Pahat	0.80	0.80	0.80
23	Pontian Kechil	0.80	0.80	0.80
24	Johor+	0.80	0.80	0.80
25-26	Sedili Besar	-	-	-
27	Endau	0.80	0.80	0.80
28	Rompin	0.80	0.80	0.80
29	Bebar+	0.80	0.80	0.80
30	Pahang+	0.80	0.80	0.80
31	Kuantan+	0.92	0.92	0.92
32	Kemaman+	0.89	0.89	0.89
33	Paka	0.92	0.92	0.92
34	Dungun	0.99	0.99	0.96
35	Marang+	0.86	0.85	0.84
36	Trengganu	0.87	0.87	0.87
37	Setiu+	0.83	0.83	0.83
38	Besut+	0.90	0.90	0.90
39	Kemasin+	0.92	0.92	0.92
40	Kelantan	0.86	0.86	0.86
41	Golok	0.86	0.85	0.84

Table 110 NET IRRIGATION WATER WITHDRAWAL BY BASIN

Unit: 10^6 m^3/y

Basin No.	Basin Name	Scheme	1980	1990	2000
1	Perlis	Minor	78	155	173
2	P. Langkawi	Minor	38	39	39
3	Kedah	Major	1,911	1,764	1,764
		Minor	20	91	166
4	Merbok+	Minor	36	47	47
5	Muda	Minor	463	501	575
6	Perai+	Minor	168	151	149
7	P. Pinang	Minor	27	29	30
8	Kerian	Minor	25	43	49
9	Kurau+	Major	478	441	441
		Minor	64	62	62
10	Perak	Major	228	454	479
		Minor	401	382	382
11	Bernam	Major	624	567	567
12 - 15	Tengi+	-	-	-	-
16	Langat	Minor	35	33	33
17	Sepang+	Minor	2	2	2
18	Linggi+	Minor	89	88	89
19	Melaka+	Minor	126	152	158
20	Kesang	Minor	59	59	59
21	Muar+	Minor	154	191	199
22	Batu Pahat+	Minor	4	4	4
23	Pontian Kechil	Minor	5	5	5
24	Johor	Minor	1	1	1
25 - 26	Sedili Besar+	-	-	-	-
27	Endau	Major	-	202	266
		Minor	26	6	6
28	Rompin	Major	-	125	125
		Minor	-	1	1
29	Bebar+	Minor	2	7	7
30	Pahang+	Major	-	94	266
		Minor	286	374	388
31	Kuantan+	Minor	7	12	12
32	Kemaman+	Minor	17	16	16
33	Paka	Minor	3	3	3
34	Dungun	Minor	2	31	36
35	Marang+	Minor	11	22	39
36	Trengganu	Minor	157	174	181
37	Setiu+	Minor	24	35	49
38	Besut+	Major	128	116	116
		Minor	21	29	29
39	Kemasin+	Major	-	159	159
		Minor	-	23	89
40	Kelantan	Major	746	678	678
		Minor	91	154	232
41	Golok	Minor	6	179	362
	Total		6,563	7,701	8,533

Table 111 DIRECT CONSTRUCTION COST OF MAJOR IRRIGATION PROJECT AS OF END 1980

	Muda II	Tanjong Karang	Krian/ Sg. Manik	Lower Trengganu	Kemasin Semerak	Rompin -Endau
Irrigation Area (ha)	25,000	20,000	30,060	2,350	9,455	11,402
Construction Period (years)	5	6	7	5	7	7
Direct Construction Cost (M$/ha)						
1. Intake Facilities	-	-	-	894	2,547	2,770
2. Main & Secondary Canals	-	-	1,412	3,646	2,995	
3. Tertiary Canal	2,567	-	991	1,913	1,318	
4. Quaternary Canal	-	3,063	-	-	-	8,412
5. Drainage Canal	508	469	632	3,081	1,719	
6. Farm Road	445	278	499	1,012	900	
7. Bunds	370	-	69	-	-	2,515*
8. Improvement of Existing Facilities	284	128	72	-	-	-
9. Buildings	619	307	302	-	-	-
10. Others	257	-	-	-	-	-
Total	5,048	4,245	3,977	10,546	9,474	13,697
Local Currency Portion (%)	55	57	56	54	41	50
Year of Original Estimate	1979	1977	1978	1978	1979	1979
Source of Original Estimate	/1	/2	/3	/4	/5	/6

Remarks; * = Dam and cutoff

Source; /1 = Ref. 3, /2 = Ref. 2, /3 = Ref. 1, /4 = Ref. 30, /5 = Ref. 29, /6 = Ref. 28

Table 112 DIRECT CONSTRUCTION COST OF MINOR IRRIGATION PROJECT AS OF END 1980

	Padang Kerbau	Ramuan Cina Besar	Paya Kemat	Sungai Bagan	
Irrigation Area (ha)	850	100	62	1,510	
Construction Period (years)		2	3	6	
Direct Const. Cost (M$/ha)					
1. Intake Facilities	631	1,040	2,000	1,411	
2. Main & Secondary Canal 3. Tertiary Canal 4. Quaternary Canal	3,913	2,860	2,512	3,919	
5. Drainage Canal	369	-	-	-	
6. Farm Road	518	-	-	-	
7. Bunds	-	-	-	-	
8. Improvement of Existing Facilities	-	-	-	183	
9. Buildings	63	-	-	31	
10. Others	-	730	-	-	
Total	5,494	4,630	4,512	5,544	Av. 5,045
Year of Original Estimate	1980	1978	1978	1978	
Source of Original Estimate	/1	/2	/3	/4	

Source; /1 = Ref. 35, /2 = Ref. 36, /3 = Ref. 37, /4 = Ref. 38

Table 113 LAND ACQUISITION FOR IRRIGATION DEVELOPMENT

Name of Project	Project Area (ha)	Acquired Area (ha)	Ratio (%)
Muda II/1	25,000	933	3.7
Krian/2	23,500	819	3.5
Sg. Manik/3	6,560	97	1.5
Tg. Karang/4	20,000	72	0.4
North Kelantan/5	12,000	190	1.6
Total	87,060	2,111	2.4

Source; /1 = Ref. 3, /2 = Ref. 1, /3 = Ref. 1, /4 = Ref. 2, /5 = Ref.

Table 114 ASSUMED UNIT CONSTRUCTION COST FOR IRRIGATION DEVELOPMENT

Unit: M$/ha

Item	Rainfed to Irrigation	Single to Double Crop	New Development	Tertiary Development
Direct Const. Cost	10,010/1	5,045/2	11,182/3	4,423/4
Land Acquisition	360/5	600/6	-	600/6
Engineering/7	1,000	505	1,118	447
Sub-total	11,370	6,150	12,300	5,470
Physical Contingency	3,430	1,850	3,700	1,630
Total	14,800	8,000	16,000	7,100

Remarks;
- /1 = Average value of unit construction cost of the Lower Trengganu and Kemasin Semerak Projects (see Table 111)
- /2 = Average value of unit construction cost of minor irrigation project (see Table 112)
- /3 = Unit construction cost of the Rompin-Endau Project excluding dam and cutoff (see Table 111)
- /4 = Average value of unit construction cost of the Muda II, Tg. Karang and Krian/Sg. Manik Projects (see Table 111)
- /5 = Land acquisition cost of rainfed paddy, M$15 x 10^3/ha x 0.024 (see Table 113) = M$360/ha
- /6 = Land acquisition cost of irrigated paddy, M$25 x 10^3/ha x 0.024 (see Table 113) = M$600/ha
- /7 = 10% of direct construction cost

Table 115 TYPE OF IRRIGATION DEVELOPMENT

Type	Without Project	With Project
A	Rainfed paddy	Irrigated single cropped paddy (Minor scheme)
B	Rainfed paddy	Irrigated double cropped paddy (Minor scheme)
C	Irrigated single cropped paddy (Minor scheme)	Irrigated double cropped paddy (Minor scheme)
D	New reclaimed land	Irrigated single cropped paddy (Minor scheme)
E	New reclaimed land	Irrigated double cropped paddy (Minor scheme)
F	Rainfed paddy	Irrigated single cropped paddy (Major scheme)
G	Rainfed paddy	Irrigated double cropped paddy (Major scheme)
H	Irrigated single cropped paddy (Major scheme)	Irrigated double cropped paddy (Major scheme)
I	New reclaimed land	Irrigated single cropped paddy (Major scheme)
J	New reclaimed land	Irrigated double cropped paddy (Major scheme)
K	Irrigated single cropped paddy (Minor scheme)	Irrigated double cropped paddy (Major scheme)
L	Irrigated double cropped paddy (Minor scheme)	Irrigated double cropped paddy (Major scheme)
M	Rainfed paddy	Non-paddy field
N		Tertiary Development

Table 116 DEVELOPMENT AREA OF MAJOR IRRIGATION SCHEMES BY TYPE

Name of Project	Basin No.	Type of Scheme	Irrigation Area (ha) 4MP	5MP	6MP	7MP	Total
Muda II	1 & 3	N	12,239	9,452	35,800	35,800	93,291
Krian/ Sg. Manik	8 & 9 10	N	26,916	-	-	-	26,916
Trans Perak IV	10	F	-	1,620	-	-	1,620
		G	-	367	-	-	367
		H	-	-	1,620	-	1,620
		J	-	7,727	-	-	7,727
	Sub-total		-	9,714	1,620	-	11,334
Tg. Karang	11 & 12	N	15,441	-	-	-	15,441
Sawah Endau	27	I	-	2,024	-	-	2,024
		J	-	3,918	2,024	-	5,222
		L	-	846	-	-	846
	Sub-total		-	6,068	2,024	-	8,092
Rompin Endau	27	F	-	700	-	-	700
		H	-	-	1,620	-	1,620
		I	-	920	-	-	920
		J	-	3,852	-	-	3,852
	Sub-total		-	5,472	1,620	-	7,092
	28	G	500	631	-	-	1,131
		J	-	4,728	-	-	4,728
	Sub-total		500	5,359	-	-	5,859
Total for the Project			500	10,831	-	-	12,951
Trans Pahang	30	F	-	2,038	-	-	2,038
		I	-	1,200	2,225	607	4,032
		J	-	-	2,428	-	2,428
		K	-	2,023	405	2,311	4,739
		L	-	-	-	117	117
	Sub-total		-	5,261	5,058	3,035	13,354
Besut	38	N	536	-	-	-	536
Kemasin Semerak	39	F	-	4,047	-	-	4,047
		G	1,484	3,373	-	-	4,857
	Sub-total		1,484	7,420	-	-	8,904
North Kelantan	40	N	11,700	-	-	-	11,700
KADA II	40	N	-	14,946	14,947	-	29,893
Total			68,816	63,692	61,069	38,835	232,412

Table 117 DEVELOPMENT AREA OF MINOR IRRIGATION SCHEMES BY TYPE (1/4)

State	Basin No.	Type of Scheme	Irrigation Area (ha) 4MP	5MP	6MP	7MP	Total
Perlis	1	A	780	4,113	618	1,029	6,540
		C	-	2,266	162	-	2,428
Total for Perlis			780	6,379	780	1,029	8,968
Kedah	2	A	428	-	-	-	428
	3	A	1,070	4,276	2,917	2,917	11,180
		B	559	178	-	-	737
		C	65	545	803	803	2,216
	Sub-total		1,694	4,999	3,720	3,720	14,133
	4	A	-	550	-	-	550
		C	-	426	-	-	426
	Sub-total		-	976	-	-	976
	5	A	2,050	4,786	553	553	7,942
		C	29	-	1,745	1,748	3,522
	Sub-total		2,079	4,786	2,298	2,301	11,464
	8	A	-	-	365	-	365
		B	441	-	-	-	441
	Sub-total		441	-	365	-	806
Total for Kedah			4,642	10,761	6,383	6,021	27,807
P. Pinang	6	A	-	458	-	-	458
	7	C	-	255	49	-	304
Total for P. Pinang			-	713	49	-	762
Perak	8	A	-	138	-	-	138
		B	395	-	-	-	395
		C	-	-	138	-	138
	Sub-total		395	138	138	-	671
	9	B	157	-	-	-	157
	10	B	341	-	-	-	341
		C	-	663	-	-	663
	Sub-total		341	663	-	-	1,004
Total for Perak			893	801	138	-	1,832

Table 118 DEVELOPMENT AREA OF MINOR IRRIGATION SCHEMES BY TYPE (2/4)

State	Basin No.	Type of Scheme	Irrigation Area (ha) 4MP	5MP	6MP	7MP	Total
N. Sembilan	16	A	-	22	16	-	38
		C	22	-	-	-	22
	Sub-total		22	22	16	-	60
	18	A	9	13	59	-	81
		C	22	-	-	-	22
	Sub-total		31	13	59	-	103
	19	A	20	-	-	-	20
		C	20	-	-	-	20
	Sub-total		40	-	-	-	40
	21	A	223	224	322	-	769
		C	694	694	166	-	1,554
	Sub-total		917	918	488	-	2,323
	30	A	-	196	-	-	196
		C	100	-	-	-	100
	Sub-total		100	196	-	-	296
Total for N. Sembilan			1,110	1,149	563	-	2,822
Melaka	18	A	-	232	-	-	232
		C	297	-	-	-	297
	Sub-total		297	232	-	-	529
	19	A	377	434	340	-	1,151
		C	831	832	122	-	1,785
	Sub-total		1,208	1,266	462	-	2,936
	20	A	-	182	-	-	182
		C	143	-	-	-	143
	Sub-total		143	182	-	-	325
Total for Melaka			1,648	1,680	462	-	3,790
Johor	20	A	79	-	-	-	79
	21	A	489	691	101	-	1,281
		C	424	424	20	-	868
	Sub-total		913	1,115	121	-	2,149
Total for Johor			992	1,115	121	-	2,228

Table 119 DEVELOPMENT AREA OF MINOR IRRIGATION SCHEMES BY TYPE (3/4)

State	Basin No.	Type of Scheme	Irrigation Area (ha) 4MP	5MP	6MP	7MP	Total
Pahang	28	A	69	-	-	-	69
	29	D	324	324	-	-	648
	30	A	-	-	955	956	1,911
		C	1,049	5,043	-	-	6,092
		D	1,436	1,439	1,056	1,056	4,987
	Sub-total		2,485	6,482	2,011	2,012	12,990
	31	D	158	158	-	-	316
Total for Pahang			3,036	6,964	2,011	2,012	14,023
Trengganu	32	A	36	-	-	-	36
		C	-	36	-	-	36
	Sub-total		36	36	-	-	72
	34	A	641	-	-	-	641
		B	206	367	187	-	760
		C	-	34	-	-	34
	Sub-total		847	401	187	-	1,435
	35	A	192	192	364	365	1,113
		C	466	467	364	365	1,662
	Sub-total		658	659	728	730	2,775
	36	A	991	991	-	-	1,982
		C	466	467	218	219	1,370
	Sub-total		1,457	1,458	218	219	3,352
	37	A	389	389	290	291	1,359
		C	202	203	290	291	986
	Sub-total		591	592	580	582	2,345
	38	A	-	445	-	-	445
		C	-	344	-	-	344
	Sub-total		-	789	-	-	789
Total for Trengganu			3,589	3,935	1,713	1,531	10,768

Table 120 DEVELOPMENT AREA OF MINOR IRRIGATION SCHEMES BY TYPE (4/4)

State	Basin No.	Type of Scheme	Irrigation Area (ha) 4MP	5MP	6MP	7MP	Total
Kelantan	39	A	1,369	-	1,191	1,191	3,751
		B	462	-	941	942	2,345
	Sub-total		1,831	-	2,132	2,133	6,096
	40	A	1,178	-	589	589	2,356
		B	1,447	1,608	1,527	1,527	6,109
	Sub-total		2,625	1,608	2,116	2,116	8,465
	41	A	2,534	5,238	3,886	3,886	15,544
		B	-	5,047	2,523	2,524	10,094
	Sub-total		2,534	10,285	6,409	6,410	25,638
Total for Kelantan			6,990	11,893	10,657	10,659	40,199
Total for Peninsular Malaysia			23,440	45,342	22,792	21,242	112,816

Table 121 INVESTMENT COST OF MAJOR IRRIGATION SCHEMES BY TYPE

Name of Project	Basin No.	Type of Scheme	Area (ha)	Investment Cost (M$10^6) 4MP	5MP	6MP	7MP	Total
Muda II	1 & 3	N	93291	85.0	67.1	254.2	254.2	660.5
Krian/Sg. Manik	10	N	26916	75.0	-	-	-	75.0
Trans Perak IV	10	F	1620	-	24.0	-	-	24.0
		G	367	-	5.4	-	-	5.4
		H	1620	-	-	13.0	-	13.0
		J	7727	-	123.6	-	-	123.6
	Sub-total		11334	-	153.0	13.0	-	166.0
Tg. Karang	11&12	N	15441	75.0	-	-	-	75.0
Sawah Endau	27	I	2024	-	32.4	-	-	32.4
		J	5222	-	51.2	32.4	-	83.6
		L	846	-	-	-	-	-
	Sub-total		8092	-	83.6	32.4	-	116.0
Rompin Endau	27	F	700	-	10.4	-	-	10.4
		H	1620	-	-	-	-	-
		I	920	-	14.7	-	-	14.7
		J	3582	-	61.6	-	-	61.6
	Sub-total		7092	-	86.7	-	-	86.7
	28	G	1131	7.4	9.3	-	-	16.7
		J	4728	-	75.6	-	-	75.6
	Sub-total		5859	7.4	84.9	-	-	92.3
Total for the Project			12951	7.4	171.6	-	-	179.0
Trans Pahang	30	F	2038	-	30.2	-	-	30.2
		I	4032	-	19.2	35.6	9.7	64.5
		J	2428	-	-	38.8	-	38.8
		K	4739	-	16.2	3.2	18.5	37.9
		L	117	-	-	-	-	-
	Sub-total		13354	-	65.6	77.6	28.2	171.4
Besut	38		536	3.1	-	-	-	3.1
Kemasin Semerak	39	F	4047	-	59.9	-	-	59.9
		G	4857	22.0	49.9	-	-	71.9
	Sub-total		8904	22.0	109.8	-	-	131.8
North Kelantan	40	N	11700	41.7	-	-	-	41.7
KADA II	40	N	29893	-	110.0	110.0	-	220.0
Total			232412	309.2	760.7	487.2	282.4	1839.5

Table 122 INVESTMENT COST OF MINOR IRRIGATION SCHEMES BY TYPE (1/4)

State	Basin No.	Type of Scheme	Area (ha)	Investment Cost (M$10^6) 4MP	5MP	6MP	7MP	Total
Perlis	1	A	6540	11.5	60.9	9.1	15.2	96.7
		C	2428	-	18.1	1.3	-	19.4
Total for Perlis			8968	11.5	79.0	10.4	15.2	116.1
Kedah	2	A	428	6.3	-	-	-	6.3
	3	A	11180	15.8	63.3	43.2	43.2	165.5
		B	737	8.3	2.6	-	-	10.9
		C	2216	0.5	4.4	6.4	6.4	17.7
	Sub-total		14133	24.6	70.3	49.6	49.6	194.1
	4	A	550	-	8.1	-	-	8.1
		C	426	-	3.4	-	-	3.4
	Sub-total		976	-	11.5	-	-	11.5
	5	A	7942	30.3	70.8	8.2	8.2	117.5
		C	3582	0.2	-	14.0	14.0	28.2
	Sub-total		11464	30.5	70.8	22.2	22.2	145.7
	8	A	365	-	-	5.4	-	5.4
		B	441	6.5	-	-	-	6.5
	Sub-total		806	6.5	-	5.4	-	11.9
Total for Kedah			27807	67.9	152.6	77.2	71.8	369.5
P. Pinang	6	A	458	-	6.8	-	-	6.8
	7	C	304	-	2.0	0.4	-	2.4
Total for P. Pinang			762	-	8.8	0.4	-	9.2
Perak	8	A	138	-	2.0	-	-	2.0
		B	395	5.8	-	-	-	5.8
		C	138	-	-	1.1	-	1.1
	Sub-total		671	5.8	2.0	1.1	-	8.9
	9	B	157	2.3	-	-	-	2.3
	10	B	341	5.0	-	-	-	5.0
		C	663	-	5.3	-	-	5.3
	Sub-total		1004	5.0	5.3	-	-	10.3
Total for Perak			1832	13.1	7.3	1.1	-	21.5

Table 123 INVESTMENT COST OF MINOR IRRIGATION SCHEMES BY TYPE (2/4)

State	Basin No.	Type of Scheme	Area (ha)	Investment Cost (M$10^6) 4MP	5MP	6MP	7MP	Total
N. Sembilan	16	A	38	-	0.3	0.2	-	0.5
		C	22	0.2	-	-	-	0.2
	Sub-total		60	0.2	0.3	0.2	-	0.7
	18	A	81	0.1	0.2	0.9	-	1.2
		C	22	0.2	-	-	-	0.2
	Sub-total		103	0.3	0.2	0.9	-	1.4
	19	A	20	0.3	-	-	-	0.3
		C	20	0.2	-	-	-	0.2
	Sub-total		40	0.5	-	-	-	0.5
	21	A	769	3.3	3.3	4.8	-	11.4
		C	1554	5.6	5.6	1.3	-	12.5
	Sub-total		2323	8.9	8.9	6.1	-	23.9
	30	A	196	-	3.0	-	-	3.0
		C	100	0.8	-	-	-	0.8
	Sub-total		296	0.8	3.0	-	-	3.8
Total for N. Sembilan			2822	10.7	12.4	7.2	-	30.3
Melaka	18	A	232	-	3.4	-	-	3.4
		C	297	2.4	-	-	-	2.4
	Sub-total		529	2.4	3.4	-	-	5.8
	19	A	1151	5.6	6.4	5.0	-	17.0
		C	1785	6.6	6.6	1.0	-	14.2
	Sub-total		2936	12.2	13.0	6.0	-	31.2
	20	A	182	-	2.7	-	-	2.7
		C	143	1.1	-	-	-	1.1
	Sub-total		325	1.1	2.7	-	-	3.8
Total for Melaka			3790	15.7	19.1	6.0	-	40.8
Johor	20	A	79	1.2	-	-	-	1.2
	21	A	1281	7.2	10.2	1.5	-	18.9
		C	868	3.4	3.4	0.2	-	7.0
	Sub-total		2149	10.6	13.6	1.7	-	25.9
Total for Johor			2228	11.8	13.6	1.7	-	27.1

Table 124 INVESTMENT COST OF MINOR IRRIGATION SCHEMES BY TYPE (3/4)

State	Basin No.	Type of Scheme	Area (ha)	Investment Cost (M$10^6) 4MP	5MP	6MP	7MP	Total
Pahang	28	A	69	1.0	-	-	-	1.0
	29	D	648	5.2	5.2	-	-	10.4
	30	A	1911	-	-	14.1	14.1	28.2
		C	6092	8.4	40.3	-	-	48.7
		D	4987	23.0	23.0	16.9	16.9	79.8
	Sub-total		12990	31.4	63.3	31.0	31.0	156.7
	31	D	316	2.5	2.5	-	-	5.0
Total for Pahang			14023	40.1	71.0	31.0	31.0	173.1
Trengganu	32	A	36	5.0	-	-	-	5.0
		C	36	-	0.3	-	-	0.3
	Sub-total		72	5.0	0.3	-	-	5.3
	34	A	641	9.5	-	-	-	9.5
		B	760	3.0	5.4	2.8	-	11.2
		C	34	-	0.3	-	-	0.3
	Sub-total		1435	12.5	5.7	2.8	-	21.0
	35	A	1113	2.8	2.8	5.4	5.4	16.4
		C	1662	3.7	3.7	2.9	2.9	13.2
	Sub-total		2775	6.5	6.5	8.3	8.3	29.6
	36	A	1982	14.7	14.7	-	-	29.4
		C	1370	3.7	3.7	1.7	1.8	10.9
	Sub-total		3352	18.4	18.4	1.7	1.8	40.3
	37	A	1359	5.6	5.6	4.3	4.3	19.8
		C	986	1.6	1.6	2.3	2.3	7.8
	Sub-total		2345	7.2	7.2	6.6	6.6	27.6
	38	A	445	-	6.6	-	-	6.6
		C	344	-	2.8	-	-	2.8
	Sub-total		789	-	9.4	-	-	9.4
Total for Trengganu			10768	49.6	47.5	19.4	16.7	133.2

Table 125 INVESTMENT COST OF MINOR IRRIGATION SCHEMES BY TYPE (4/4)

State	Basin No.	Type of Scheme	Area (ha)	Investment Cost (M$10^6) 4MP	5MP	6MP	7MP	Total
Kelantan	39	A	3751	20.3	-	17.6	17.6	55.5
		B	2345	6.8	-	13.9	13.9	34.6
	Sub-total		6096	27.1	-	31.5	31.5	90.1
	40	A	2356	17.4	-	8.7	8.7	34.8
		B	6109	21.4	23.8	22.6	22.6	90.4
	Sub-total		8465	38.8	23.8	31.3	31.3	125.2
	41	A	15544	37.5	77.5	57.5	57.5	230.0
		B	10094	-	74.7	37.3	37.4	149.4
	Sub-total		25638	37.5	152.2	94.8	94.9	379.4
Total for Kelantan			40199	103.4	176.0	157.6	157.7	594.7
Total for Peninsular Malaysia			112816	323.8	587.3	312.0	292.4	1515.5

Table 126 ACTUAL O&M COST OF MINOR IRRIGATION SCHEMES BY TYPE IN 1979

Unit: M$/ha

Stage	Type of Scheme				
	G	G+P	P	C	I
Perlis	21.6	-	-	-	-
Kedah	36.3	-	155.6	40.3	-
P. Pinang	95.6	140.4	86.9	-	-
Perak	8.3	83.1	172.1	10.9	-
Selangor	145.6	42.1	-	-	-
N. Sembilan	82.9	-	75.6	-	-
Melaka	70.4	61.3	65.1	67.9	-
Johor	83.9	-	220.9	-	-
Pahang	65.3	40.8	56.6	30.4	24.3
Trengganu	22.7	-	100.1	17.6	-
Kelantan	39.2	24.8	154.4	-	-
Average	61.1	65.4	120.8	33.4	24.3
Updated O&M cost as of end 1980	69	74	137	-	-

Remarks; G = Gravity, P = Pumping
C = Control drainage, I = Inundation

Source; DID (Ref. 6)

Table 127 RATIO OF O&M COST TO CONSTRUCTION COST

Name of Project	Year of Estimation	(1) Construction Cost (M$/ha)	(2) O&M Cost (M$/ha/y)	(2)/(1) (%)
Muda II/1	1979	3,117	54	1.7
Krian/Sg. Manik/2	1978	3,348	53	1.6
Tg. Karang/3	1978	3,133	36	1.1
North Kelantan/4	1976	2,628	39	1.5
Rompin-Endau/5	1979	12,331	90	0.7
Kemasin Semerak/6	1980	2,323	23	1.0

Remarks; (1) Excluding price contingency

Source; /1 = Ref. 3, /2 = Ref. 1, /3 = Ref. 2, /4 = Ref. 5, /5 = Ref. 28, /6 = Ref. 29

Table 128 CLASSIFICATION OF MANPOWER

Grade	Category
A	Engineer, Superscale F Engineer, Superscale G Engineer, Senior Timescale Engineer, Timescale Quantity surveyor
B	Technical Assistant, Special Grade Technical Assistant, Timescale
C	Special Grade Technician Timescale Technician Draftsman Grade I Draftsman Grade II
C	Stenographer Clerk Storekeeper
D	Typist Junior Clerk Junior Storekeeper Office Boy Drivers I.M.G.

Table 129 EXISTING MANPOWER IN FEDERAL DID IN 1982

Unit: person

Item	Grade A	Grade B	Grade C	Grade D
1. Headquarters (Administration)	10	-	-	55
2. Planning	18	10	42	21
3. Hydrology	14	6	29	30
4. Design	19	17	40	42
5. Ampang Research Station	10	4	17	31
6. Project	140	71	410	811
7. Training	8	6	4	36
8. Mechanical Workshop (Ipoh)	11	4	8	249
Total	230	118	550	1,275

Remarks; Grade A: Engineer, B: Technical Assistant,
C: Technician, D: Others

Source; DID

Table 130 NUMBER OF POSTS IN STATE DID AND AUTHORITY

Unit: Persons

State	Grade A	Grade B	Grade C	Grade D	Date of Information
State DID					
Perlis	1	4	17	243	1980
Kedah	13	13	56	348	1980
P. Pinang	4	10	47	678	1980
Perak	17	18	161	1,906	1980
Selangor	15	25	117	1,109	1980
N. Sembilan	5	10	53	402*	1980/*1979
Melaka	3	8	22	264	1980
Johor	12	18	92	1,032*	1980/*1982
Pahang	12	12	82	493	1975
Trengganu	8	13	44	419	1981
Kelantan	15	14	83	280*	1980/*1977
Sabah	16	24	72	278	1980
Sarawak	17	13	45	230	1980
Sub-total	138	182	891	7,682	
Authority					
MADA	22	12	83	1,075	1981
KADA	14	8	50	559	1981
Sub-total	36	20	133	1,634	
Total	174	202	1,024	9,316	

Remarks; Grade A: Engineer, B: Technical Assistant,
C: Technician, D: Others

Table 131 ASSUMED CALCULATION STANDARD FOR MANPOWER REQUIREMENT FOR IRRIGATION DEVELOPMENT

Grade		Construction: Major Scheme (person/scheme)	Construction: Minor Scheme (person/10^3 ha)	O & M (person/10^3 ha)
A	Engineer	1	0.5	0.5
B	Technical Assistant	3	1	1
C	Technician	6	4	5
D	Others	12	8	50

Table 132 ESTIMATED MANPOWER REQUIREMENT FOR IRRIGATION DEVELOPMENT

Unit: persons

Category	4MP	5MP	6MP	7MP
Construction				
Engineer	13	28	18	14
Technical Assistant	27	62	42	30
Technician	54	124	84	60
Others	108	248	168	120
Total Government Staff	202	462	312	224
O & M				
Engineer	0	23	45	56
Technical Assistant	0	46	90	112
Technician	0	230	450	560
Others	0	2300	4500	5600
Total Government Staff	0	2599	5085	6328
Construction and O&M				
Engineering	13	51	63	70
Technical Assistant	27	108	132	142
Technician	54	354	534	620
Others	108	2548	4668	5720
Total Government Staff	202	3061	5397	6552

FIGURES

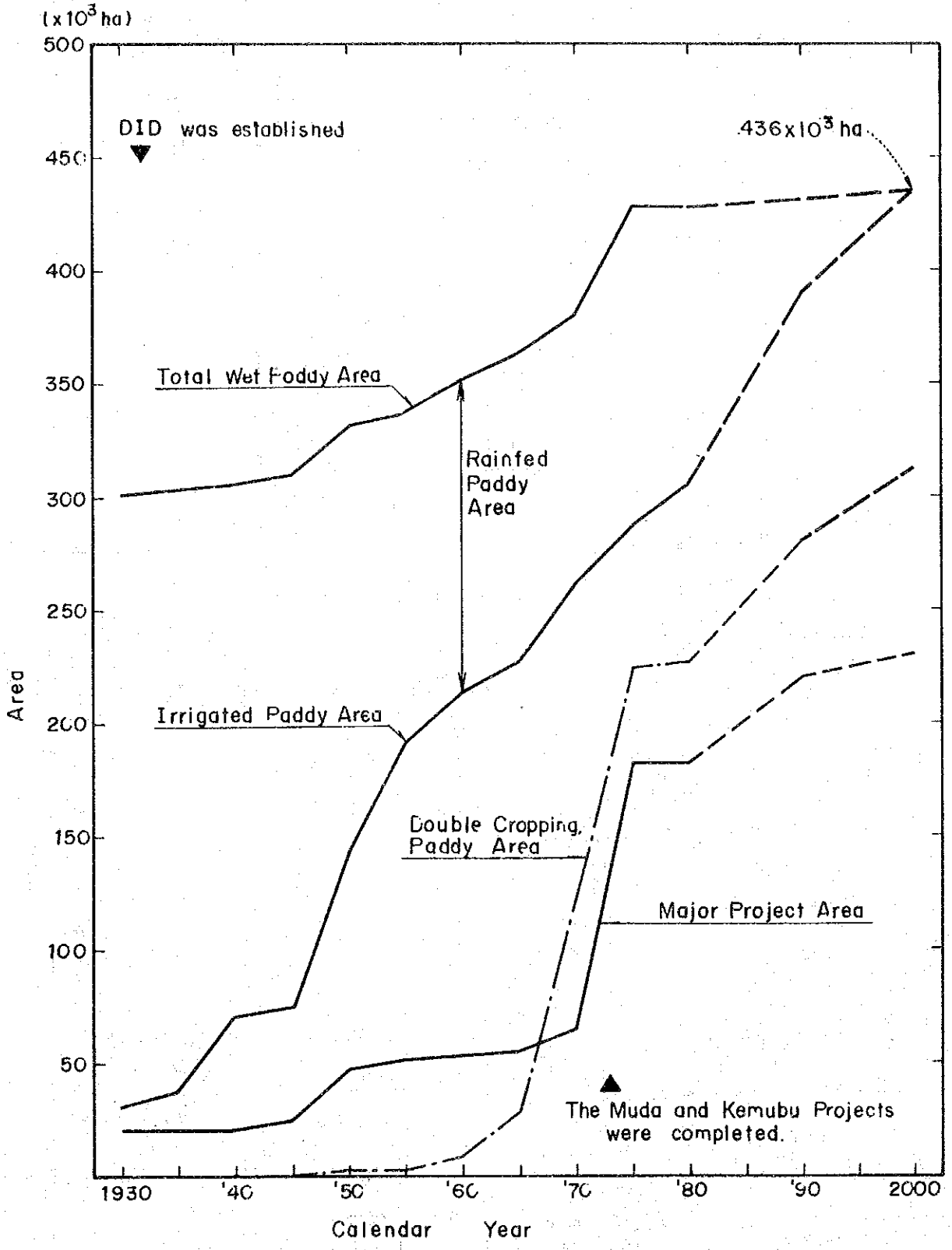

Fig. 1 Irrigation Development in Peninsular Malaysia

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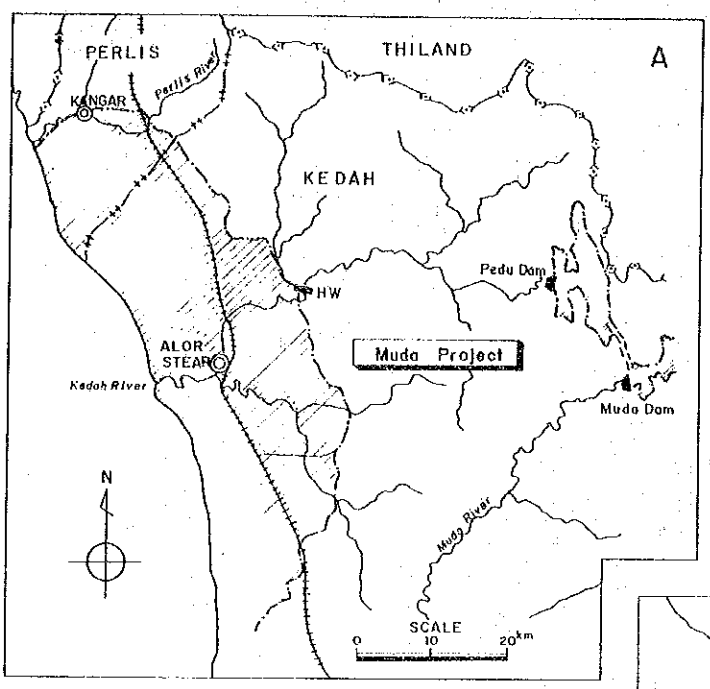

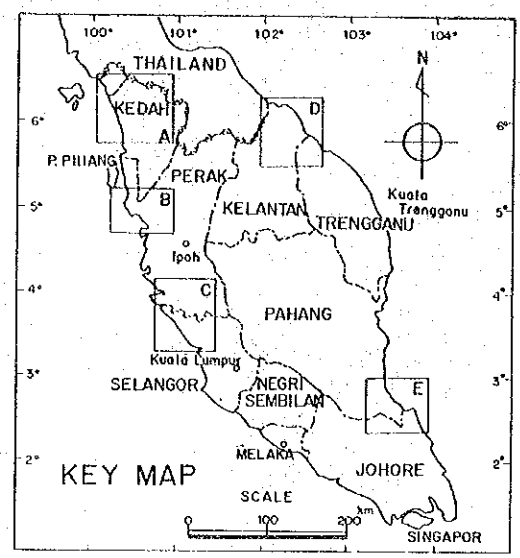

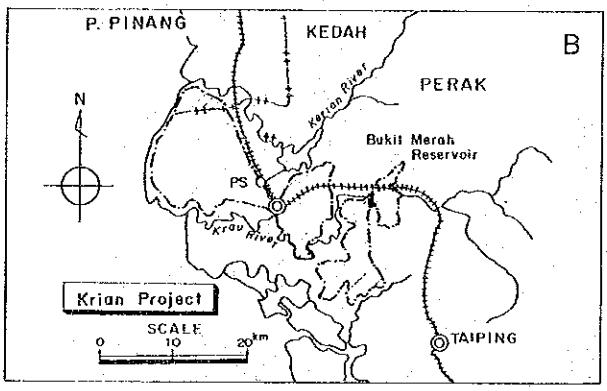

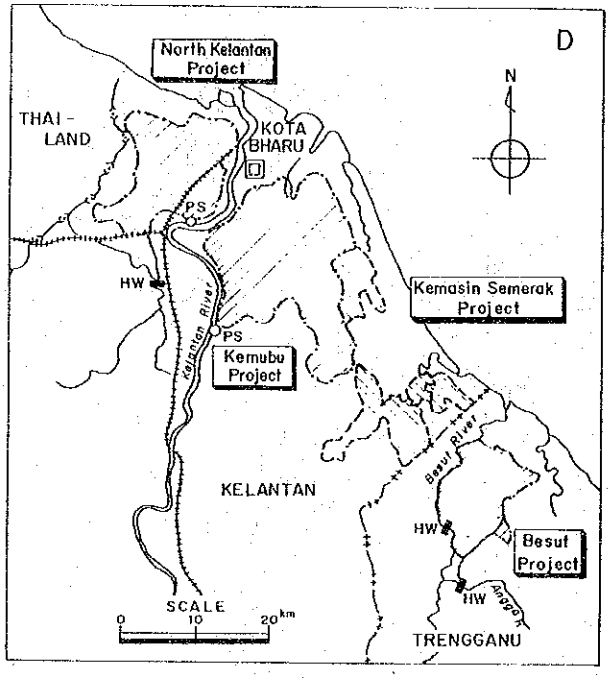

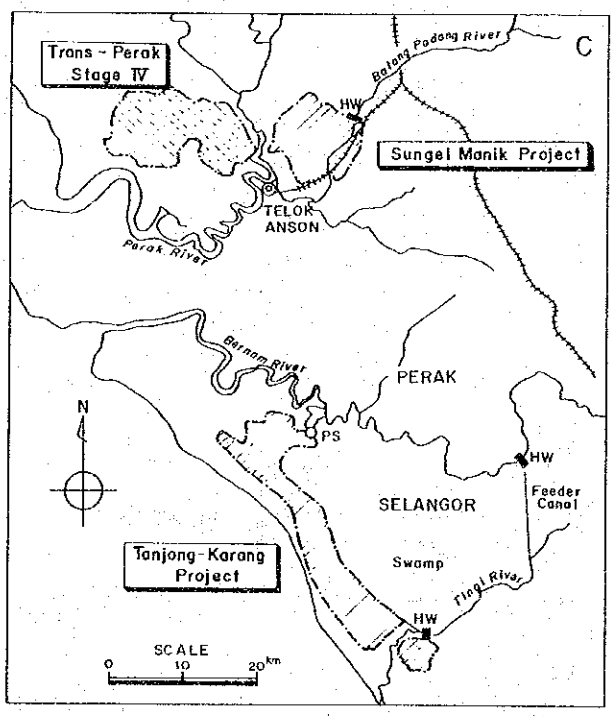

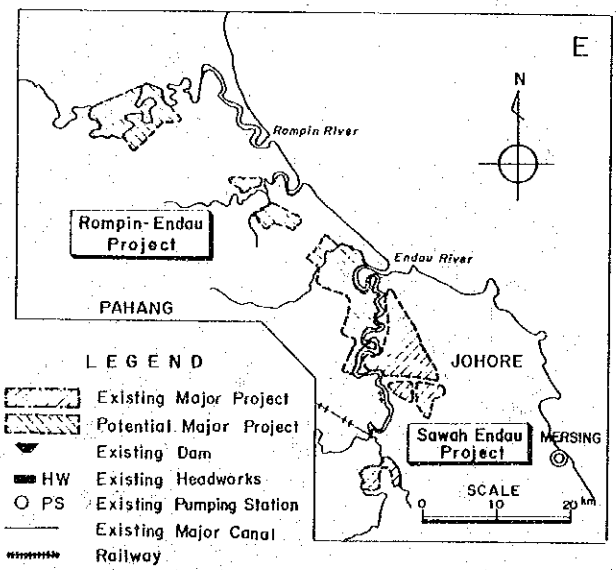

LEGEND

- Existing Major Project
- Potential Major Project
- Existing Dam
- HW Existing Headworks
- O PS Existing Pumping Station
- Existing Major Canal
- Railway
- State Boundary

Fig. 2

Location of Major Irrigation Projects

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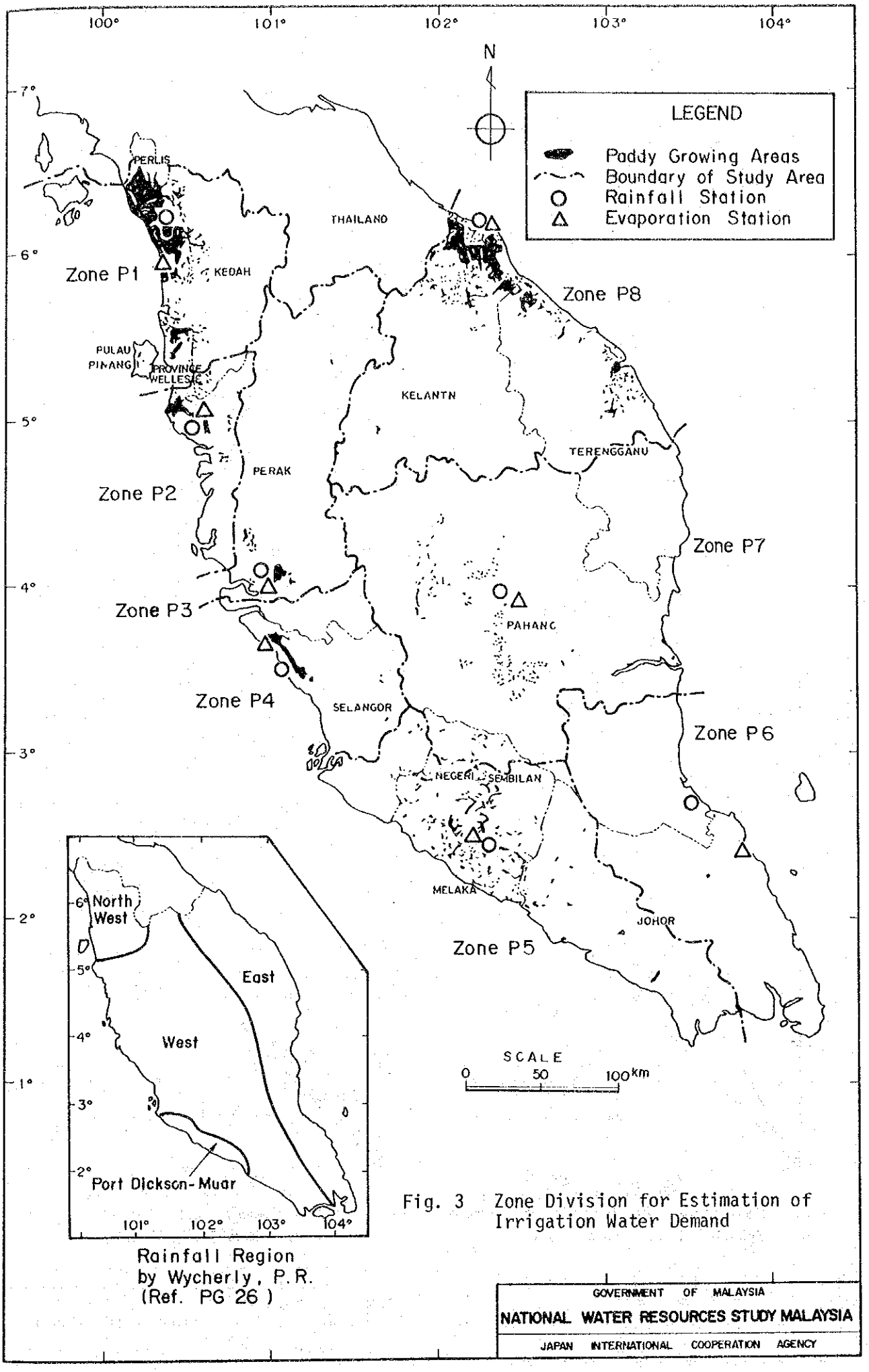


Fig. 3 Zone Division for Estimation of Irrigation Water Demand

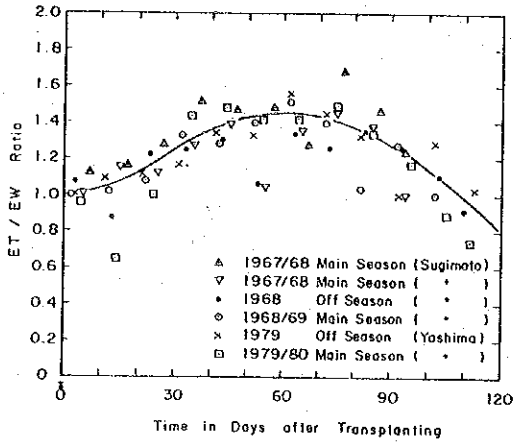


Fig.4 Variation of ET/EW Ratio with Growing Stage

Note = ET = Evapotranspiration measured by tank
EW = Evaporation measured by tank in paddy field

↓ : 25 days after sowing

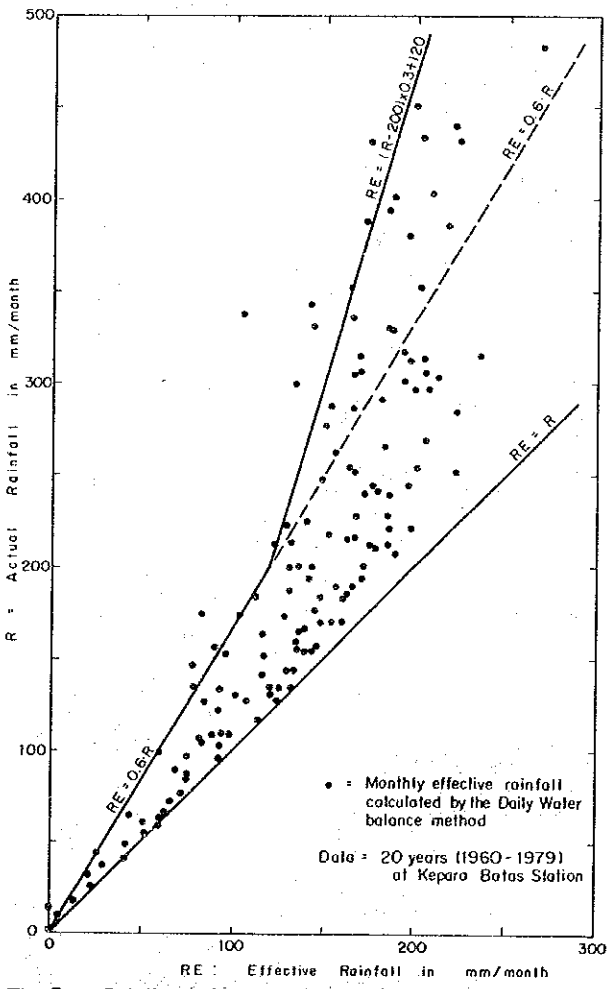


Fig. 5 Relation between Actual Rainfall and Effective Rainfall at Kepara Batas Station

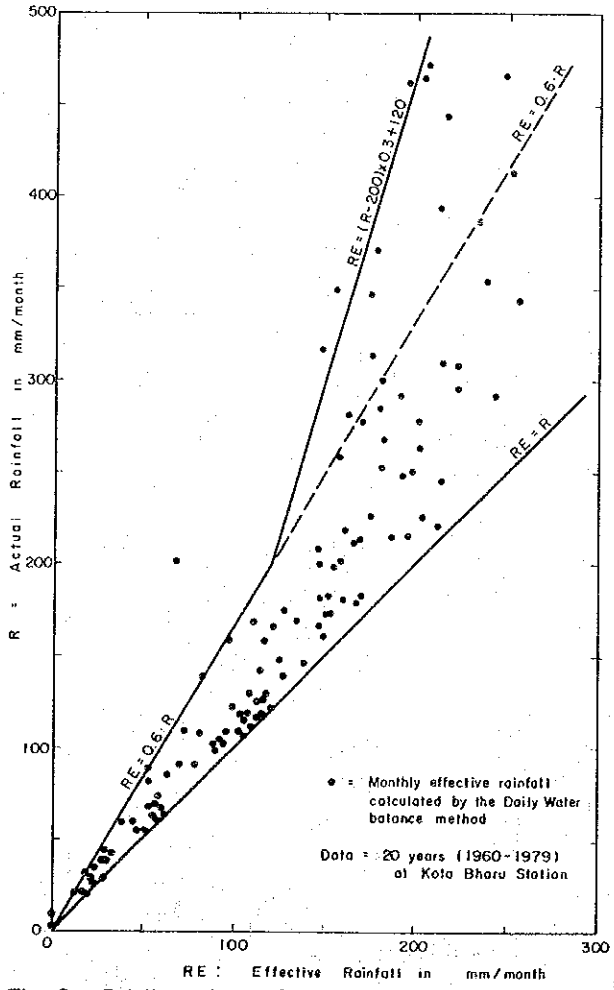
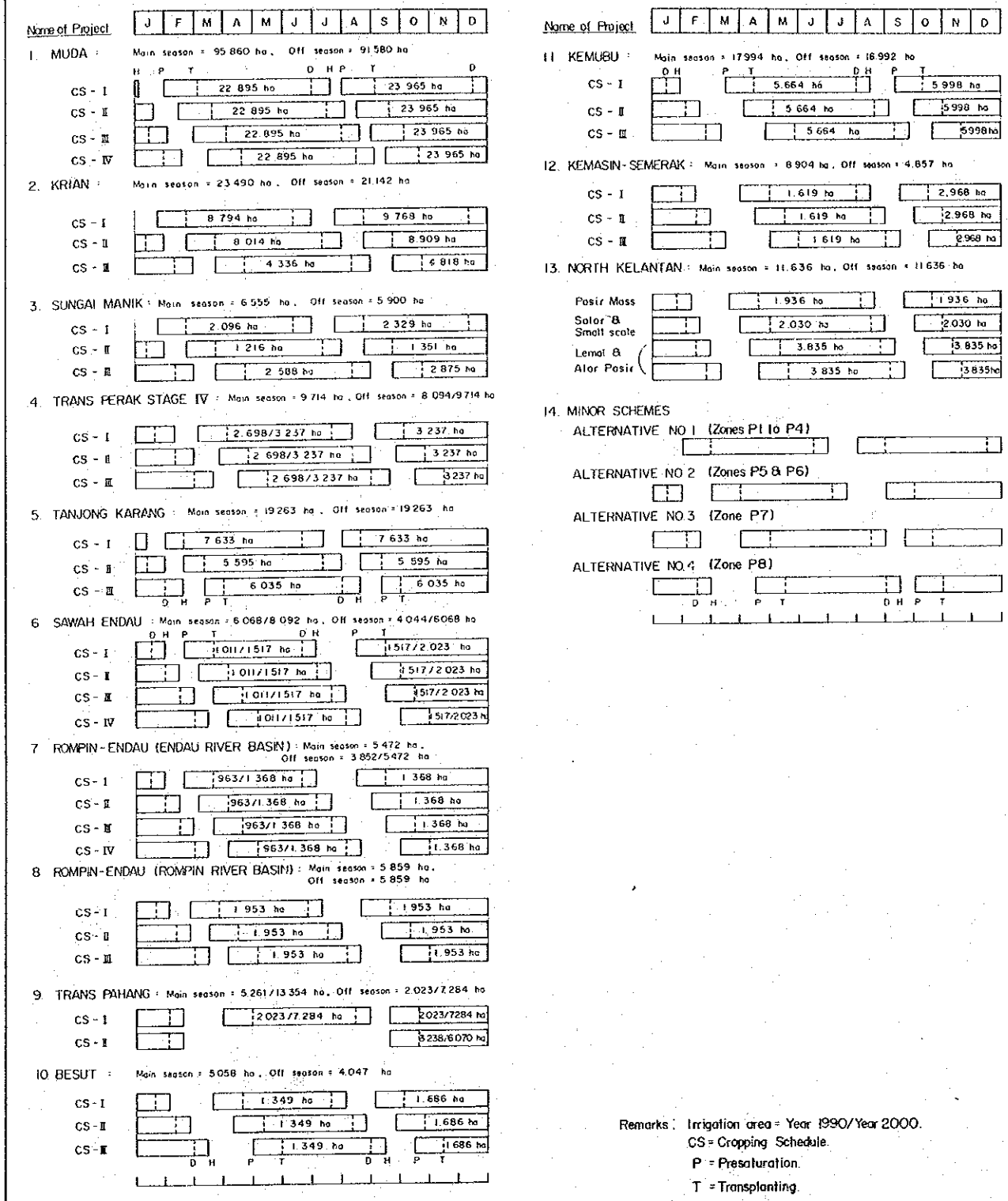


Fig. 6 Relation between Actual Rainfall and Effective Rainfall at Kota Bharu Station



Remarks : Irrigation area = Year 1990/Year 2000.
CS = Cropping Schedule.
P = Presaturation.
T = Transplanting.
D = Drainage
H = Harvesting

Fig. 7 Assumed Cropping Schedule for Irrigation Projects

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