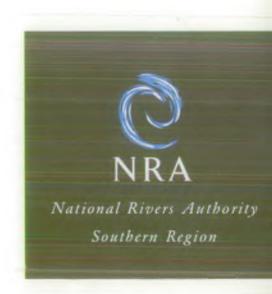
# RIVER CATCHMENT MANAGEMENT PLANS DATA REPORT







# River Catchment Management Plans Data Report 1993

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The information contained in this report has been compiled in good faith but its accuracy ity.

1	2
3	4

The photographs on the front cover are from the following catchments

l Itchen

2 Test

Arun

Medway

National Rivers Authority Information Centre Head Office

Class No

Accession No ARRI

# Introduction

River Catchment Management Plans (RCMPs) are being prepared by the National Rivers Authority (NRA) to provide a framework for

Presenting the NRA's vision for improving the water environment

Integrating the management of the NRA's functions

Seeking public input into the implementation of NRA policy.

It is intended that this document will supplement Southern Region's Catchment Management Plans by presenting key statistics for each catchment which, when combined, summarise the Region as a whole. The Data Report will be updated in future years.

NRA Southern Region has been divided nominally into 13 catchment areas. Some of these are based on a single major river system such as the Itchen, while others group together a number of rivers and streams such as the Meon, West Hampshire and Adur/Ouse catchments. Taken all together, the 13 catchment areas form a complete mosaic across the Region.

The catchment management plan boundaries represent topographical catchments. However, in some catchment areas it has been necessary to include chalk blocks where the sub-surface boundary is not coincident with the surface RCMP boundary. An example of this is the Worthing chalk block which has been incorporated in the Arun RCMP.

The combined data for the Region is presented first. This is followed by the data for the individual catchments (in alphabetical order). Generally, the Regional total represents the sum of the individual catchments. There are however a few exceptions to this in the Conservation figures. Simple maps show the catchment's major rivers, main towns and significant sub-catchment resource areas. The appendix lists sources of information, clarifies terms and abbreviations and highlights points for consideration when referring to the statistics.

The information presented is by no means comprehensive. The selection has been chosen to provide a broad over-view for each catchment area and the Region. Greater detail is provided in the respective Catchment Management Plan Consultation Reports and Final Action Plans.

Catchment Management Plan Consultation Reports and Final Action Plans that have been published or are nearing completion are shown in the table below.

Catchment Name	Consultation Report	Final Action Plan
Test	yes	early 1993/94
Medway	yes	early 1993/94
ltchen	yes	1993/94
Darent	1993/94	
Stour	1993/94	
Eastern Rother	1993/94	

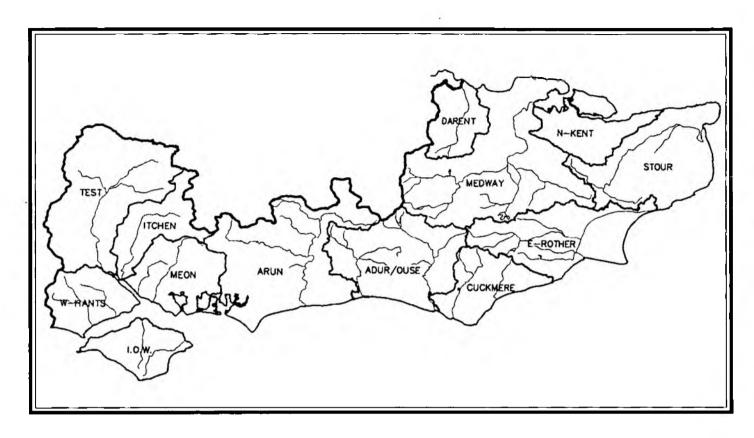
The remaining Catchment Management Plans will be produced over the period 1993/94 to 1997/98.

Further information may be obtained from Southern Region's Headquarters at the following address:

Catchment Management Plan Co-ordinator
National Rivers Authority, Southern Region
Guildbourne House
Chatsworth Road
Worthing
West Sussex
BN111LD

Telephone: 0903 820692

# **Southern Region**



# Regional Area 10 979 km<sup>2</sup>

#### Geology

Geological strata are all sedimentary and relatively young, ranging in age from the topmost formation of the Jurassic series, the Purbeck Beds in the Weald, to recent deposits of peat and alluvium. High quality Chalk is a major feature of the Region and forms the most important aquifer.

#### **Topography**

The North and South Downs form the main topographical features together with the Weald in the South East and the Hampshire Basin in the West.

Maximum:

297 m AOD Test Catchment

Minimum:

0 m AOD All Catchments

#### **Resident Population**

1991 estimate:

4.6 m

2001 estimate:

4.8 m

1991 holiday trips to Region

10.5 m

#### Longest River in Region

River Medway

110 km Source - Sheemess

#### **ADMINISTRATION**

County Council	Persons per ha	Area (km²) in Region	% of Region
Kent	4.0	3755	34.2
Hampshire	4.1	2617	23.8
West Sussex	3.5	1853	16.9
East Sussex	3.8	1801	16.4
Isle of Wight	3.3	386	3.5
Surrey	6.1	267	2.4
Wiltshire	1.6	184	1.7
Greater Lond	on 42.3	106	1.0
Berkshire	5.8	9	0.1
Dorset	2.4	0.7	5 0.0

51 District/Borough/City Councils (all or part) in Southern Region

Main Towns and population (1991)

Southampton 199860, Portsmouth 180950, Brighton 143600, Chatham/Rochester/Strood 129700, Margate/Ramsgate 125000, Havant 104200, Worthing 96960, Gillingham 95200, Maidstone 90000, Hove 85360, Eastbourne 81400, Hastings 80820.

Rainfall (weighted av. mm/yr) Annual		Effective
Average	790	290
l in 10 yr drought	620	160
Total authorised abstraction (N	Ml)	1 695 055
% Auth. abst. from GW		52%
% Auth. abst. high/med loss		66%
Actual abstraction (MI)		674328

Water Supply R	Area	rs Volume	Reliable
8 reservoirs	(ha)	(Gross Mm <sup>3</sup> )	yield (Ml/d)
combined total	787	61905	213.5

Water Companies	Area (km²)	% of Region
	in Region	_
Southern Water	4208	38.3
Mid Kent	2031	18.5
South East Water, Mid Suss	sex 966	8.8
Portsmouth	873	7.9
South East Water, Eastbour	ne 789	7.2
Thames Water	419	3.8
Folkestone & Dover	414	3.8
South East Water, Mid Sou	thern 307	2.8
East Surrey	264	2.4
Bournemouth & West Hant	s 262	2.4
South East Water, West Ke	nt 237	2.2
Wessex Water	209	1.9
(Southern Water = SWS and	d South East	Water = SEW)

37 Resource Areas in Southern Region

# **FLOOD DEFENCE**

	L	ength (km)
Coastline	to Schedule 4	796.6
	inc. main tidal waters	1123.7
Main River	including tidal lengths	2648.9
Sea Defences	NRA responsibility	143.80
	LA responsibility	41.72
	Other responsibility	10.93
Tidal Banks	NRA responsibility	411.60
16 Internal Drainage	Districts in Southern R	egion

# WATER QUALITY

Length of Fi	reshwater Rive	er in NWC CI	ass (km)
Class		Objective	Achieved
			1990 survey
1A Good		340.3	500.1
- 1B Good		1178.9	1043.4
2 Fair		704.9	514.2
3 Poor		2.0	150.3
4 Bad		0	18.1
	Total	2226.1	2226.1
Number of I	EC Designated	Bathing Wat	eers 67
STWs - Disc	charges to		Volume (m³/d)
		682	414100
Estuary		73	341046

# **FISHERIES**

Total

Sea

Length of EC Designa	Freshwater	Tidal
Cyprinid	399.68	30.2
Salmonid	268.76	4.5
CONSERVATI	ON	
National Nature Reser	ves	15
Sites of Special Scient	tific Interest (SSSIs)	353
Water dependent SSS	Is	258
Ramsar and/or Specia	l Protection	
Areas (designated and	proposed)	16

RECREATION AND NAVIGATION			
Harbour of Rye	NRA responsibility		
Length of towpath (l	km)	52 approx.	
Length of inland nav	rigation (km) NRA maintained LA/Other maintained	89.1 54.8 34.3	
Number of NRA ma	intained locks	10 Medway 1 E Rother	

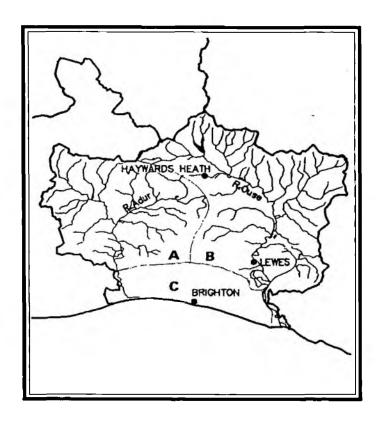
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765126

5

760

# **Adur and Ouse**



#### Catchment Area 1072.69 km<sup>2</sup>

#### Geology

North - predominantly Weald Clay, Central - Gault Clay and Greensand, South - Chalk.

#### **Topography**

Maximum: 248 m AOD Minimum: 0 m AOD

## **Resident Population**

1991 estimate: 500000 2001 estimate: 511000

#### **Main Rivers and Streams**

R Adur, R Ouse, Chess Str, Cockhaise Brook, Shell Brook, Clayhill Str, Bevern Str, R Uck, Pellingford Str, Glynde Reach, Longford Str, Herrings Str, Pookbourne Str.

#### **ADMINISTRATION**

East Sussex County Council

562 km<sup>2</sup> within catchment 52.4 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Brighton	25.1	66	6.2
Hove	35.7	23	2.1
Lewes	3.0	264	24.6
Wealden	1.6	209	19.5

West Sussex County Council

510.7 km<sup>2</sup> within catchment 47.6 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Adur	13.9	26	2.4
Horsham	2.1	244	22.8
Mid Sussex	3.6	241	22.4

Main Towns and population (1991)

Brighton 143600, Burgess Hill 25670, Cuckfield 2660, Haywards Heath 22640, Hove 85360, Lewes 15380, Newhaven 10210, Shoreham/Southwick/Portslade 32000.

14		• •
Rainfall (mm/year)	Annual	Effective
Average	838	347
1 in 10 yr drought	659	190
	-	
Adur (A		Chalk (C)
Auth abst (Ml) 161	0 24049	42052
% from GW 809	% 15%	95%
0/ hish/madless 070	V 0/8/	0.00
% high/med loss 979	% 96%	96%
Actual abst (MI) 62	26 15350	35667
Actual aust (MI) 02	.0 13330	33007
River Flow (cumecs)	Q50	Q95
Adur, East	0.45	0.15
Adur, West	0.27	0.02
Ouse	1.91	0.31
Water Supply Reserve	oirs	
Area	Volume	Reliable
(ha)	(Gross Mm <sup>3</sup> )	yield (Ml/d)
Ardingly 73	5206	53.65 }
Barcombe Mills 16	546	combined}
Water Companies	Area (km²)	% Catchment
	in catchment	area
SEW, Mid Sussex	623	58
SWS Sussex (Coast)	247	23
SWS Sussex (West)	168	16
SEW, Eastbourne	35	3
Resource Areas		
Name	Number	Area (km²)
Seaford Chalk (part)	19	19.8
River Ouse	21	469.1
Brighton Chalk	22	197.7
River Adur (part)	23	376.6
Worthing Chalk (part		9.5
Transportation (Part	,	7.5

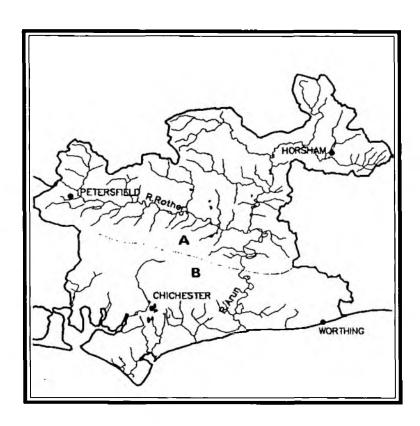
# FLOOD DEFENCE

	1.5	
	Lengt	h (km)
Coastline	to Schedule 4	40.2
	including main tidal waters	40.2
Main River	including tidal lengths	290.5
Sea Defences	NRA responsibility	13.15
	LA responsibility	0
Tidal Banks	NRA responsibility	92.1
Internal Drainage I	Districts Area	(km²)
River Adur		17.37
River Ouse		55.16

# WATER QUALITY

2 2 2 2 2 2 2 2 2 2 2 2		
Length of Freshwater Rive	r in NWC CI	ass (km)
Class	Objective	Achieved
Ciuss	Objective	1990 survey
Adur		1770 Survey
1A Good	0	0
1B Good	34.7	30.1
2 Fair	53.9	43.2
3 Poor	0	15.3
4 Bad	0	0
Adur Total	88.6	88.6
ridai i otai	00.0	00.0
Ouse		
1A Good	1.0	14.0
1B Good	120.2	72.5
2 Fair	24.5	51.2
3 Poor	24.3	8.0
4 Bad	0	0.0
Ouse Total	145.7	145.7
Ouse I otal	143.7	143.7
Number of EC Designated	Bathing Wat	ers 5
STWs - Discharges to	Number	Volume (m <sup>3</sup> /d)
River	123	33320
Estuary	6	7618
Sea	0	0
<b>FISHERIES</b>		
	-	-
Length of EC Designated F	isheries (km	)•
bengai of be besignated i	Freshwater	Tidal
Cyprinid	77.33	6.27
Salmonid	0	0.27
Samong	0	U
CONCEDUATION	т	
CONSERVATION	٠.,	
National Nature Reserves		2
Sites of Special Scientific 1	interest (SSS)	(s) 25
Water dependent SSSIs		13
Ramsar and/or Special Pro	tection	
Areas (designated and prop	oosed)	0
<b>Environmentally Sensitive</b>	Areas	South Downs
DECDE ATTOMA		
RECREATION A	ND NAV	IGATION
Length of towpath (km)		0
Length of inland navigation	n (km)	0

# Arun



#### Catchment Area 1484.02 km<sup>2</sup>

#### Geology

North - predominantly Weald Clay, Central - Chalk and Greensand, South - Tertiary deposits and Chalk.

## **Topography**

Maximum: Minimum: 294 m AOD

0 m AOD

#### **Resident Population**

1991 estimate:

480000

2001 estimate:

520000

#### Main Rivers and Streams

R Arun, Chichester Canal, Loxwood Str, R Lavant, R Lod, R Ems, R Rother, R Chilt, Ferring Rife.

# **ADMINISTRATION**

West Sussex County Council

1289.2 km<sup>2</sup> within catchment 86.8 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Adur	13.9	18	1.2
Arun	5.9	227	15.3
Chichester	1.3	748	50.4
Horsham	2.0	258	17.4
Mid Sussex	3.6	5	0.3
Worthing	29.6	33	2.2

Hampshire County Council

78.8 km<sup>2</sup> within catchment 5.3 % of total catchment area

District	People	Area (km²)	% Catchment
	per ha	in catchment	area
E Hampshire	2.0	79	5.3

Surrey County Council

116.0 km<sup>2</sup> within catchment 7.9 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Mole Valley	3.1	49	3.3
Waverley	3.3	66	4.5
Guildford	4.5	l	0.1

Main Towns and population (1991)

Arundel 3260, Billingshurst 5910, Bognor Regis 20605, Chichester 25675, Horsham 40960, Littlehampton 24290, Midhurst 4790, Petersfield 12690, Worthing 96960.

WATER RES	OURCES	
		4
Rainfall (mm/year)	Annual	Effective
Average	862	354
l in 10 yr drought	671	204
,	22	
	0.5	
	Arun (A)	Chalk (B)
Auth abst (MI)	87041	90047
(37843 Ml from Arv		
This is not reflected	in the actual abstrac	ction figure.)
0/ f CW	510/	070/
% from GW	51%	97%
% high/med loss	48%	81%
Actual abst (MI)	25797	54036
River Flow (cumecs		Q95
R Arun	1.26	0.32
Water Supply Decem		None
Water Supply Reser	VUIIS	Mone
Water Companies	Area (km²)	% Catchment
	in catchment	area
SWS Sussex (West)		44
Portsmouth	430	29
SWS Sussex (Coast)		11
SEW, Mid Southern		7.5
Thames Water	91	6
East Surrey	28	2
SEW, Mid Sussex	4	- 0.5
Resource Areas		
Name	Number	Area (km <sup>2</sup> )
River Adur (part)	23	2.8
Worthing Chalk (par		162.2
River Arun	25	482.0
Western Rother	26	355.2
Chichester Chalk	27	481.8
FLOOD DEF	ENCE	
I LOOD DUI		
		Length (km)
Coastline	to Schedule 4	142.5
Constitute	including main tio	
	c.aa	11 WANT 1 12.0

including tidal lengths

NRA responsibility

NRA responsibility

LA responsibility

# WATER QUALITY

WATER QUA	LITY	
- 1 CF 1	n' ' yaya a	4
Length of Freshwate		
Class	Objective	Achieved
Amin		1990 survey
Arun IA Good	5.3	22.0
1B Good	122.1	22.0 97.5
2 Fair	76.2	65.9
3 Poor	70.2	18.2
4 Bad	0	0
Arun Tot	_	203.6
Chalk (Sussex Rifes	)	
1A Good	0	2.3
1B Good	3.1	7.7
2 Fair	29.7	9.0
3 Poor	0	12.1
4 Bad	0	1.7
Chalk Total	al 32.8	32.8
Number of EC Design	gnated Bathing Wa	ters 9
STWs - Discharges	to Number	Volume (m³/d)
River	128	51287
Estuary	8	670
Sea	0	0
	Ū	· ·
FISHERIES	1 12	_
Length of EC Design		
Cuminid	Freshwater 73.87	Tidal 0
Cyprinid Salmonid	57.55	0
Samonia	37.33	U
CONSERVAT	CION	
National Nature Res	erves	1
Sites of Special Scie	ntific Interest (SSS	Is) 55
Water dependent SS		28
Ramsar and/or Spec	ial Protection	
Areas (designated as	nd proposed)	3
Environmentally Ser	nsitive Areas	South Downs
RECREATIO	N AND NAV	IGATION
Length of towpath (l	km)	6
Length of inland nav	igation (km)	partial - 27
Chichester Canal	LA/Other maintai	ned (km) 6
Wey & Arun Canal	LA/Other maintai	

- proposed restoration

- already restored (of 21km)

Main River

Sea Defences

Tidal Banks

River Arun

South West Sussex

Internal Drainage Districts

408.27

18.81

13.74

65.1

33.04

50.05

Area (km²)

21

# **Cuckmere and Pevensey Levels**



#### Catchment Area 527.49 km<sup>2</sup>

# Geology

North East - Hastings Beds and Weald Clay, recent deposits in marsh areas, South West - Chalk with minor Gault Clay and Greensand.

# **Topography**

Maximum: 183 m AOD Minimum: 0 m AOD

#### **Resident Population**

 1991 estimate:
 259000

 2001 estimate:
 287000

#### **Main Rivers and Streams**

Cuckmere R, Wallers Haven, Bull R, Huggletts Str, Combe Haven, Powdermill Str, East Str, Pevensey Haven.

#### **ADMINISTRATION**

East Sussex County Council
527.5 km² within catchment
100 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Eastbourne	18.4	49	9.3
Hastings	27.2	29	5.6
Lewes	3.0	36	6.7
Rother	1.6	95	18.1
Wealden	1.6	318	60.3

Main Towns and population (1991)

Bexhill 38905, Eastbourne 81400, Hailsham 17940, Hastings 80820, Heathfield 10680, Seaford 20930.

Rainfall (mm/year)		Effective
Average	808	325
1 in 10 yr drought	637	180
		-
	Cuckmere (A)	Chalk (B)
Auth abst (MI)	19634	19392
% from GW	31%	100%
% high/med loss	89%	98%
Actual abst (MI)	4347	22066
Divor Flow (average)	050	005
•	~	Q95
0.00.0.0.0		0.07
Wallers Haven	0.28	0.09
Water Supply Reservo	irs	
Area	Volume	Reliable
(ha)	(Gross Mm <sup>3</sup> )	yield (Ml/d)
	3546	19.8
	I in 10 yr drought  Auth abst (MI)  % from GW  % high/med loss  Actual abst (MI)  River Flow (cumecs)  Cuckmere R  Wallers Haven  Water Supply Reservo  Area  (ha)	Average 808 I in 10 yr drought 637  Cuckmere (A) Auth abst (MI) 19634  % from GW 31%  % high/med loss 89%  Actual abst (MI) 4347  River Flow (cumecs) Q50 Cuckmere R 0.40 Wallers Haven 0.28  Water Supply Reservoirs Area Volume (ha) (Gross Mm³)

SEW, Eastbourne	462.5	- "	88
SEW, Mid Sussex	37.0		7-
SWS Sussex (East)	28.0		5
Resource Areas Name Pevensey Levels	Number 18	Area	(km²) 274.7

Area (km²) in catchment

19

20

% Catchment

area

106.1

146.7

67.14

# **FLOOD DEFENCE**

Seaford Chalk (part)

River Cuckmere

Water Companies

	I	Length (km)
Coastline	to Schedule 4	51.6
	including main tidal w	vaters 51.6
Main River	including tidal lengths	209.72
Sea Defences	NRA responsibility	12.95
	LA responsibility	3.63
Tidal Banks	NRA responsibility	15.4
Internal Drainage D	Districts	Area (km²)
River Cuckmere		7.47

# WATER QUALITY

Length of Freshwater River in NWC Class (km)			
Class	Objective	Achieved	
	•	1990 survey	
1A Good	0	7.6	
IB Good	53.4	50.2	
2 Fair	62.5	47.0	
3 Poor	0	11.1	
4 Bad	0	0	
Tota	1 115.9	115.9	
Number of EC Design	nated Bathing Wat	ers 6	
STWs - Discharges to	Number	Volume (m³/d)	
River	27	26212	
Estuary	2	149	
Sea	0	0	

# **FISHERIES**

Length of EC Desi	gnated Fisheries (km):	
	Tidal	
Cyprinid	40.56	0
Salmonid	10.8	0

# **CONSERVATION**

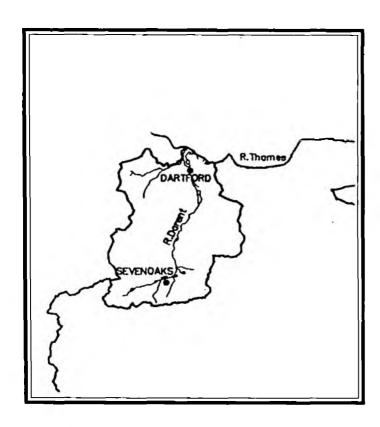
National Nature Reserves	2
Sites of Special Scientific Interest (SSSIs	) 20
Water dependent SSSIs	16
Ramsar and/or Special Protection	
Areas (designated and proposed)	1
Environmentally Sensitive Areas	South Downs

# **RECREATION AND NAVIGATION**

Length of towpath (km)	0
Length of inland navigation (km)	0

Pevensey Levels

# **Darent**



#### Catchment Area 400.96 km<sup>2</sup>

## Geology

North and Central - Chalk, North West - Tertiary deposits, South - Greensand and Gault Clay.

## **Topography**

Maximum: 251 m AOD Minimum: 0 m AOD

#### **Resident Population**

1991 estimate: 417000 2001 estimate: 422000

#### **Main Rivers and Streams**

R Darent, R Cray, R Shuttle.

Surrey County Council

# **ADMINISTRATION**

Kent County Council

290.5 km<sup>2</sup> within catchment 72.4 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Dartford	10.9	53	13.3
Sevenoaks	3.0	228	56.8
Tonbridge	4.2	9	2.3

Persons Area (km²)

4.7 km<sup>2</sup> within catchment

1.2 % of total catchment area

District % Catchment per ha in catchment агеа Tandridge 3.1 1.2

Greater London

105.8 km<sup>2</sup> within catchment 26.4 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Bexley	35.6	32	7.9
Bromley	19.1	64	16.0
Greenwich	43.6	10	2.5

Main Towns and population (1991)

Bexley 19600, Dartford 62400, Gillingham 95200, Orpington 44160, Sevenoaks 21100, Sidcup 20300.

Rainfall (mm/year)	Annual -	Effective
Average	655	191
1 in 10 yr drought	515	50
Auth abst (Ml)		101086
% from GW		96%
% high/med loss		99%
Actual abst (Ml)		70834
River Flow (cumecs)	Q50	Q95
R Darent	0.46	0.02
Water Supply Reservoirs		None

	in catchment	area
Thames Water	262	65
Mid Kent	60	15
SEW, West Kent	50	13
SWS Kent (Medway)	18	4
East Surrey	11	3
Resource Areas		- •
Name	Number	Area (km²)
Darent & Cray	37	401.0

Area (km²)

% Catchment

# **FLOOD DEFENCE**

Water Companies

	Le	ngth (km)
Coastline	to Schedule 4	0
	including main tidal wa	ters 9.2
Main River	including tidal lengths	78.7
Sea Defences	NRA responsibility	0
	LA responsibility	0
Tidal Banks	NRA responsibility	13.1
Internal Drainage Di		Area (km²)
Commissioned Area	West of Gravesend	6 approx.

# WATER QUALITY

Length of Freshwater F	liver in NWC Cl	ass (km)	
Class	Objective	Achieve	
		1990 :	survey
1A Good	0		13.4
1B Good	38.2		45.7
2 Fair	20.9		0
3 Poor	0		0
4 Bad	0		0
Total	59.1		59.1
Number of EC Designa	ited Bathing Wat	ers	0
STWs - Discharges to	Number	Volume	(m³/d)
River	11		141
	0		0
Estuary			

# **FISHERIES**

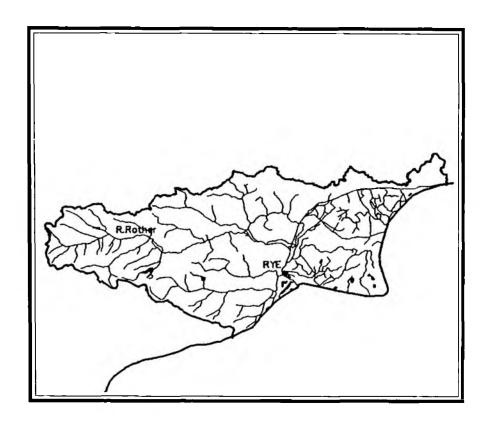
Length of EC	Designat	ed Fisheries (km):	
	Tidal		
Cyprinid	17	51.64	0
Salmonid		0	0

# **CONSERVATION**

National Nature Reserves	0
Sites of Special Scientific Interest (SSSIs)	19
Water dependent SSSIs	18
Ramsar and/or Special Protection	
Areas (designated and proposed)	0
Environmentally Sensitive Areas	-

Length of towpath (km)	0
Length of inland navigation (km)	0

# **Eastern Rother**



#### Catchment Area 970.83 km<sup>2</sup>

## Geology

Hastings Beds and Weald Clay, recent deposits in marsh areas.

#### **Topography**

Maximum:

197 m AOD

Minimum:

0 m AOD

#### Resident Population

1991 estimate:

170000

2001 estimate: 188000

#### Main Rivers and Streams

Eastern Rother, Royal Military Canal, R Brede, R Tillingham, R Dudwell, R Darwell, New Sewer, Clobsden Sewer.

# **ADMINISTRATION**

East Sussex County Council

489.2 km<sup>2</sup> within catchment 50.4 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Hastings	27.2	5	0.5
Rother	1.6	406	41.8
Wealden	1.6	78	8.0

Kent County Council

481.6 km<sup>2</sup> within catchment 49.6 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Ashford	1.6	191	19.6
Shepway	2.6	223	23.0
Tunbridge	Wells 3.0	68	7.0

Main Towns and population (1991)

Battle 5730, Hythe 18000, Lydd 5309, New Romney 6204, Rye 4210, Tenterden 5700.

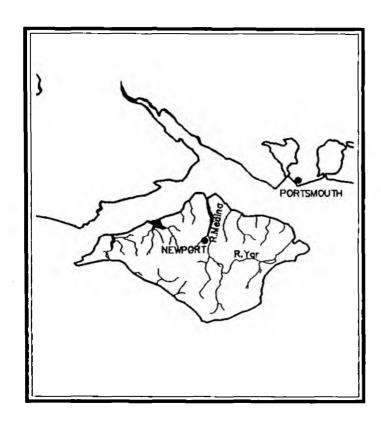
Rainfall (mm/ye Average I in 10 yr droug		Annual 754 596	Effective 246 133
Auth abst (Ml)			76494
% from GW			70%
% high/med loss	s		41%
Actual abst (MI	)		28148
River Flow (cur	necs)	Q50	Q <b>9</b> 5
E Rother	- ,	0.9	0.21
Water Supply R	eservoir		
	Area	Volume	Reliable
	(ha)	(Gross Mm <sup>3)</sup>	yield (Ml/d)
Darwell	73	4728	21.9
Powdermill	21	856	2.1
Water Compani	es	Area (km²)	% Catchment
		in catchment	area
Mid Kent		363	37
SEW, Eastbourn		280	29
SWS Sussex (E		137	14
Folkestone & D		132	14
SEW, Mid Suss	ex	59	6
Resource Areas	12	7.7	
Name		Number	Area (km²)
Romney Marsh		15	206.7
Lower Rother		16	558.8
Upper Rother		17	205.3

# **FLOOD DEFENCE**

	I	Length (km)
Coastline	to Schedule 4	55.2
	including main tidal w	vaters 55.2
Main River	including tidal lengths	324.0
Sea Defences	NRA responsibility	39.97
	LA responsibility	0
Tidal Banks	NRA responsibility	10.8
Internal Drainage Di	stricts	Area (km²)
Denge Southbrooks		37.59
Romney Marsh Leve	els	105.03
Pett Level		34.01
Rother		65.92
Walland Marsh		89.16

WATER QUA	LITY	1 3		
Length of Freshwate	er River in NWC Cl Objective	ass (km) Achieved		
	·	1990 survey		
1A Good	40.6	11.1		
1B Good	120.3	111.8		
2 Fair	44.7	51.5		
3 Poor	1.0	<b>24.7</b>		
4 Bad	0	7.5		
Tot	al 206.6	206.6		
Number of EC Desi	gnated Bathing Wat	ers 6		
STWs - Discharges	to Number	Volume (m³/d)		
River	82	13760		
Estuary	1	1180		
Sea	1	2700		
FISHERIES  Length of EC Desig  Cyprinid  Salmonid	nated Fisheries (km Freshwater 27.9 3.5	): Tidal 10.04 0		
CONSERVAT	<b>TION</b>			
National Nature Res		1		
Sites of Special Scient	entific Interest (SSS)	(s) 21		
Water dependent SS	SSIs	18		
Ramsar and/or Spec	ial Protection			
Areas (designated a	nd proposed)	1		
Environmentally Se	Environmentally Sensitive Areas			
RECREATION AND NAVIGATION				
Harbour of Rye	NRA responsibilit	ty		
Length of towpath (	km)	0		
Length of inland na Royal Military Cana	_	23.8		
NRA maintained los	eks	1 - Scots Float		

# Isle of Wight



#### Catchment Area 386.54 km<sup>2</sup>

# Geology

North - predominantly Tertiary deposits, Central - Chalk and minor Greensand, South - Wadhurst Clay and Ashdown Beds with minor Chalk and Greensand.

# **Topography**

Maximum: Minimum: 236 m AOD 0 m AOD

# **Resident Population**

1991 estimate: 2001 estimate:

127000

135400

#### **Main Rivers and Streams**

R Medina, E Yar, W Yar.

#### **ADMINISTRATION**

Isle of Wight County Council

386.5 km<sup>2</sup> within catchment 100 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Medina	6.1	117	30.2
South Wight	2.0	2 <b>7</b> 0	69.8

Main Towns and population (1991)

Cowes 19920, Newport 25035, Ryde 26150, Sandown/ Shanklin 17760, Ventnor 5980.

146	2	
Rainfall (mm/year)	Annual	Effective
Average	850	361
l in 10 yr drought	662	203
Auth abst (MI)		29372
% from GW		65%
% high/med loss		85%
Actual abst (MI)		12506
River Flow (cumecs)	Q50	Q95
R Medina	0.19	0.08
Lukely Brook	0.04	0.01
E Yar	0.34	0.13
Water Supply Reservoirs		None

# WATER QUALITY

Length of Freshwater River	in NWC Cl	ass (km)
Class	Objective	Achieved
		1990 survey
1A Good	0	20.3
1B Good	51.5	38.1
2 Fair	36.0	16.5
3 Poor	0	12.6
4 Bad	0	0
Total	87.5	87.5
Number of EC Designated Bathing Waters		
STWs - Discharges to	Number	Volume (m <sup>3</sup> /d)
River	20	3257
Estuary	5	12415
Sea	3	7160

Water Companies	Area (km²)	% Catchment
	in catchment	area
SWS IoW	386.5	100

Resource Areas		
Name	Number	Ārea (km²)
Isle of Wight	36	386.5

# **FISHERIES**

Length of EC De	signated Fisheries (km):	
	- Freshwater	Tidal
Cyprinid	14.28	0
Salmonid	0	0

# **CONSERVATION**

National Nature Reserves	0
Sites of Special Scientific Interest (SSSIs)	40
Water dependent SSSIs	20
Ramsar and/or Special Protection	
Areas (designated and proposed)	0
Environmentally Sensitive Areas	-

# **FLOOD DEFENCE**

Coastline	Ler to Schedule 4 including main tidal water	ngth (km) 127.5 ers 127.5
Main River	including tidal lengths	114.27
Sea Defences	NRA responsibility LA responsibility	0.5 1.44
Tidal Banks	NRA responsibility	1.0
Internal Drainage Di	None	

Length of towpath (km)	0
Length of inland navigation (km)	0

# Itchen



Catchment Area 473.0 km<sup>2</sup>

#### Geology

North - predominantly Chalk, South - Tertiary deposits.

#### **Topography**

Maximum: Minimum:

234 m AOD

0 m AOD

#### **Resident Population**

1991 estimate: 2001 estimate:

240000

242000

#### **Main Rivers and Streams**

R Itchen, Candover Str, R Alre, Cheriton Str, Monks Brook, Bow Lake, Allington Lane Str, Sholing Common Str, Weston Common Str.

#### **ADMINISTRATION**

Hampshire County Council

473.0 km<sup>2</sup> within catchment 100 % of total catchment area

District	Persons	Area (km²)	% Catchment	
	per ha	in catchment	агеа	
Basingstoke	2.3	41	8.7	
East Hampshi	re 2.0	53	11.1	
Eastleigh	13.3	46	9.7	
Southampton	39.5	28	6.0	
Test Valley	1.6	15	3.1	
Winchester	1.5	290	61.3	

Main Towns and population (1991)

Eastleigh 53905, Southampton (part) 199860, Winchester 29465.

Rainfall (mm/year) Average I in 10 yr drought	Annual 870 678	Effective 404 196
Auth abst (Ml)		230748
% from GW		40%
% high/med loss		33%
Actual abst (Ml)		76025
River Flow (cumecs)	Q50	Q95
R Itchen	4.81	2.94
Water Supply Reservoirs		None

Water Companies	Area (km²)	% Catchment
	in catchment	area
SWS Hants	364	77
SEW, Mid Southern	90	19
Portsmouth	19	4

Resource Areas Name	Number	Area (km²)
River Meon (part)	29	24.2
Lower Itchen (part)	31	288.3
Upper Itchen (part)	32	158.9
Upper Test (part)	34	1.6

# **FLOOD DEFENCE**

	Lengt	h (km)	
Coastline	to Schedule 4	0	
	including main tidal waters	7.3	
Main River	including tidal lengths	105.7	
Sea Defences	NRA responsibility	0	
	LA responsibility	0	
Tidal Banks	NRA responsibility	0	
Internal Drainage Districts			

# WATER QUALITY -

Length of Freshwater Rive	r in NWC Cl	ass (km)	
Class	Objective	Achieved	
		1990 survey	
1A Good	- 60.6	79.4	
1B Good	30.8	16.2	
2 Fair	6.3	2.1	
3 Poor	0	0	
4 Bad	0	0	
Total	97.7	97.7	
Number of EC Designated	Bathing Wat	ers O	
Number of Le Designated	Dudinig Wa	ers 0	
STWs - Discharges to	Number	Volume (m <sup>3</sup> /d)	
River	8	44969	
Estuary	2	42700	
Sea	0	0	

# **FISHERIES**

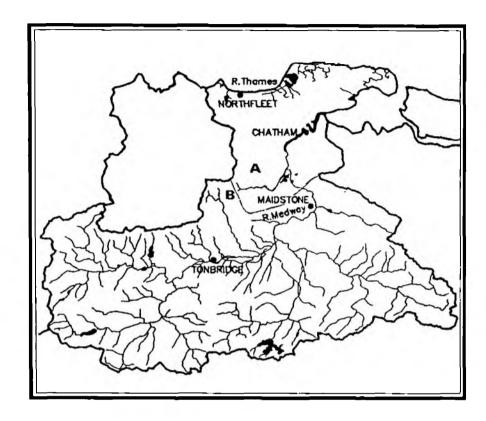
Length of E	C De	esigr	iated	Fisheries (km):	
7	•	-	-	Freshwater	Tidal
Cyprinid				0	0
Salmonid				51.13	0

# **CONSERVATION**

National Nature Reserves	0
Sites of Special Scientific Interest (SSSIs)	10
Water dependent SSSIs	10
Ramsar and/or Special Protection	
Areas (designated and proposed)	1
Environmentally Sensitive Areas	

Length of towpath (km)	15 approx.
Length of inland navigation (km)	0

# Medway



#### Catchment Area 1780.99 km<sup>2</sup>

#### Geology

North - Chalk, Gault Clay and Greensand Central - Weald Clay, South - Hastings Beds.

## Topography

Maximum: Minimum: 277 m AOD 0 m AOD

#### **Resident Population**

1991 estimate: 2001 estimate:

734000 755000

#### Main Rivers and Streams

R Medway, R Teise, R Beult, R Bourne, R Eden, R Len, Lesser Teise, Edenbrook.

#### **ADMINISTRATION**

Kent County Council

1372.0 km<sup>2</sup> within catchment 77.0 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Ashford	1.6	133	7.5
Dartford	1 <b>0</b> .9	16	0.9
Gillingham	29.4	12	0.7
Gravesham	9.3	102	5.7
Maidstone	3.5	309	17.4
Rochester	9.1	164	9.2
Sevenoaks	3.0	144	8.1
Tonbridge	4.2	22 <b>9</b>	12.8
Tunbridge We	ells 3.0	263	14.7

East Sussex County Council

222.2 km² within catchment 12.5 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Rother	1.6	13	0.7
Wealden	1.6	209	11.7

Surrey County Council

146.8 km² within catchment 8.2 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Tandridge	3.1	147	8.2

West Sussex County Council

40.0 km<sup>2</sup> within catchment 2.3 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Mid Sussex	3.6	40	2.3

Main Towns and population (1991)

Chatham/Rochester/Strood 129700, Crowborough 19120, East Grinstead 23955, Gravesend/Northfleet 70900, Maidstone 90000, Swanscombe 6000, Tonbridge 34900, Tunbridge Wells 56300.

D: CII ( . /	<b>1</b> .7		ECC
Rainfall (mm/year)		Annual	Effective
Average		729	235
1 in 10 yr drou	ght	571	145
		Estuary (A)	Upper M (B)
Auth abst (MI)		133549	187729
% from GW		52%	24%
% high/med los	ss	56%	95%
Actual abst (M	1)	74489	36371
River Flow (cu	mecs)	Q50	Q95
R Medway		4.79	1.49
Reservoirs	Area	Volume	Reliable
	(ha)	(Gross Mm <sup>3</sup> )	yield (Ml/d)
Bewl Water	312	31300	75
Bough Beech	130	10100	27
Weir Wood	113	5623	14
Water Compan	ies	Area (km²)	% Catchment
_		in catchment	агеа
Mid Kent		822	46
SWS Kent (Me	dway)	270	15
SEW, Mid Sus	sex	243	14
East Surrey	•	225	13
SEW, West Ke	nt	186	10
Thames Water		24	1
SEW, Eastbour	ne	11	1
Resource Areas	3	Number	Area (km²)
Medway Estua	гу	1	335.5
Medway (midd	le)	2	380.8
Eden		3	222.8
Medway (uppe	r)	4	253.1
Teise		5	227.8
Beult		6	294.3
West Swale (pa	art) ·	7	66.7
EL OOD D	DDDA	ICIE.	

# FLOOD DEFENCE

I DOOD DES	BITOE	
	L	ength (km)
Coastline	to Schedule 4	12.0
	including main tidal w	aters 119.4
Main River	including tidal lengths	259.74
Sea Defences	NRA responsibility	7.14
	LA responsibility	0.42
Tidal Banks	NRA responsibility	80.7
Internal Drainage I	Districts	Area (km²)
Commissioned Are	eas E & W of Gravesend	<b>≃ 42</b>
Lower Medway		19.20
Upper Medway		139.13

# WATER QUALITY

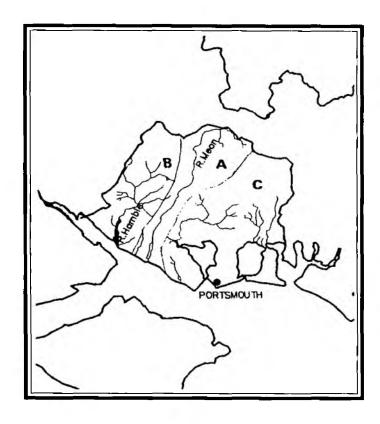
Length of Freshwater Riv		
Class	Objective	Achieved
		1990 survey
1A Good	23.7	51.1
1B Good	312.2	204.3
2 Fair	60.1	108.6
3 Poor	0.2	24.8
4 Bad	0	7.4
Total	396.2	396.2
Number of EC Designate	d Bathing Wat	ers 0
STWs - Discharges to	Number	Volume (m³/d)
River	164	140903
Estuary	11	42709
Sea	0	0
FISHERIES		
FISHERIES  Length of EC Designated	l Fisheries (km	<b>)</b> :
Length of EC Designated	Freshwater	Tidal
Length of EC Designated	Freshwater 87.2	Tidal 0
Length of EC Designated	Freshwater	Tidal
Length of EC Designated	Freshwater 87.2	Tidal 0
Length of EC Designated Cyprinid Salmonid	Freshwater 87.2 0	Tidal 0
Length of EC Designated Cyprinid Salmonid  CONSERVATIO  National Nature Reserves Sites of Special Scientific	Freshwater 87.2 0	Tidal 0 0 2 1s) 49
Length of EC Designated Cyprinid Salmonid  CONSERVATIO  National Nature Reserves Sites of Special Scientific Water dependent SSSIs	Freshwater 87.2 0  N s c Interest (SSS	Tidal 0 0
Cyprinid Salmonid  CONSERVATIO  National Nature Reserves Sites of Special Scientific Water dependent SSSIs Ramsar and/or Special Preserved	Freshwater 87.2 0  N s c Interest (SSS)	Tidal 0 0 0 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
Length of EC Designated Cyprinid Salmonid  CONSERVATIO  National Nature Reserves Sites of Special Scientific Water dependent SSSIs	Freshwater 87.2 0  N s c Interest (SSS rotection oposed)	Tidal 0 0 2 Is) 49

# RECREATION AND NAVIGATION

Length of towpath (km)	31
Length of inland navigation (km) Medway (Allington Lock - Leigh Barrier)	31
NRA maintained	31
NRA maintained locks	10

Marshes

# Meon, Hamble and Portsmouth



Catchment Area 570.99 km<sup>2</sup>

#### Geology

North - predominantly Chalk, South - Tertiary deposits.

## **Topography**

Maximum: Minimum:

248 m AOD

0 m AOD

#### **Resident Population**

1991 estimate: 2001 estimate:

589000 605000

#### **Main Rivers and Streams**

R Meon, R Hamble, R Wallington.

# **ADMINISTRATION**

Hampshire County Council

557.5 km<sup>2</sup> within catchment 97.6 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
E Hampshire	2.0	83	14.5
Eastleigh	13.3	34	6.0
Fareham	13.4	79	13.9
Gosport	34.1	27	4.8
Havant	21.7	55	9.7
Portsmouth	41.6	39	6.9
Southampton	39.5	1	0.2
Winchester	1.5	239	41.8

Main Towns and population (1991)

Fareham 33165, Gosport 79750, Havant 104200, Hayling Island 15510, Horndean 11960, Portsmouth 180950.

West Sussex County Council

13.5 km<sup>2</sup> within catchment 2.4 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Chichester	1.3	14	2.4

-	-	• •	
Rainfall (mm/year)	)	Annual	Effective
Average		850	369
1 in 10 yr drought		662	205
	les.		
Meon	ı (A)	Hamble (B)	Ports. (C)
Auth abst (Mi) 19	9903	12223	60088
% from GW	82%	95%	99%
% high/med loss	53%	99%	97%
Actual abst (MI)	9163	5259	28181
River Flow (cumed	cs)	Q50	Q95
R Meon		0.70	0.19
R Hamble		0.27	0.09
Water Supply Rese	ervoirs	:	None
Water Companies		Area (km²)	% Catchment
•		in catchment	area
Portsmouth		425	74
SWS Hants		114	20
SEW, Mid Souther	m	32	- 6
-			*E = 3
Resource Areas			
Name		Number	Area (km²)
Wallington		28	301
Meon (part)		29	102.5
Hamble		30	147.7
Lower Itchen (part	<b>.</b> )	31	19.8

# **FLOOD DEFENCE**

	Leng	th (km)
Coastline	to Schedule 4	142.4
	including main tidal water	s 165.3
Main River	including tidal lengths	160.0
Sea Defences	NRA responsibility	2.95
	LA responsibility	8.61
Tidal Banks	NRA responsibility	23.8
Internal Draina	ge Districts	None

# WATER QUALITY

WATER QUALITY		
Length of Freshwater River	in NWC CI	ass (km)
Class	Objective	
	•	1990 survey
Meon		i i
1A Good	0	24.4
1B Good	38.2	13.8
2 Fair	0	0
3 Poor	0	0
4 Bad	0	0
Meon Total	38.2	38.2
Hamble		
1A Good	0	10.4
1B Good	0	25.8
2 Fair	58.1	16.9
3 Poor	0	5.0
4 Bad	0	0
Hamble Total	58.1	58.1
Portsmouth etc.		
1A Good	0	5.9
1B Good	0	44.8
2 Fair	65.3	13.1
3 Poor	0	0
4 Bad	0	1.5
Portsmouth Total	65.3	65.3
Number of EC Designated I	Bathing Wa	ters 7
STWs - Discharges to	Number	Volume (m³/d)
River	19.	6386
Estuary	7	136237
Sea	0	0
FISHERIES		

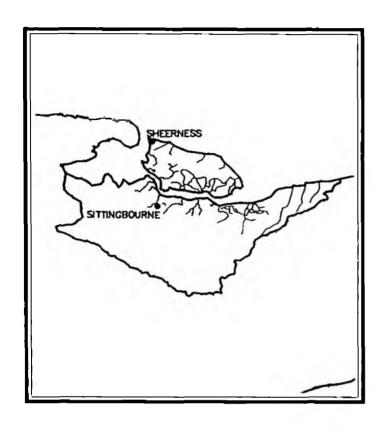
Length of EC Desig	mated hisheries (km):	
	Freshwater	Tidal
Cyprinid	0	0
Salmonid	24.42	0

# **CONSERVATION**

National Nature Reserves	2
Sites of Special Scientific Interest (SSSIs	) 25
Water dependent SSSIs	16
Ramsar and/or Special Protection	
Areas (designated and proposed)	2
Environmentally Sensitive Areas	South Downs

Length of towpath (km)	0
Length of inland navigation (km)	0

# **North Kent**



#### Catchment Area 530.05 km<sup>2</sup>

## Geology

North - recent deposits in marsh areas and Tertiary deposits, South - predominantly Chalk.

## **Topography**

Maximum: 171 m AOD Minimum: 0 m AOD

# **Resident Population**

 1991 estimate:
 226000

 2001 estimate:
 234000

#### **Main Rivers and Streams**

Swalecliffe Brook and minor streams feeding to the Swale and Medway Estuary.

#### **ADMINISTRATION**

Kent County Council

530.1 km<sup>2</sup> within catchment 100 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Ashford	1.6	18	3.4
Canterbury	4.0	56	10.5
Gillingham	29.4	22	4.1
Maidstone	3.5	64	12.2
Swale	3.1	370	69.8

Main Towns and population (1991)

Faversham 15800, Herne Bay 31900, Sheerness 31000, Sittingbourne 38200, Whitstable 29800.

Rainfall (mm/year) Average 1 in 10 yr drought	Annual 665 523	Effective 200 48
Auth abst (Ml)		49470
% from GW		97%
% high/med loss		96%
Actual abst (MI)		33607
River Flow (cumecs) No significant rivers	Q50 -	Q95 -
Water Supply Reservoirs		None

Water Companies	Area (km²)	% Catchment
	in catchment	area
Mid Kent	345	65
SWS Kent (Medway)	185	35

Number	Area (km²)
7	159.2
8	370.9
	Number 7 8

# **FLOOD DEFENCE**

	I	Length (km)
Coastline	to Schedule 4	69.6
	including main tidal w	vaters 198.2
Main River	including tidal lengths	55.66
Sea Defences	NRA responsibility	20.01
	LA responsibility	3.38
Tidal Banks	NRA responsibility	71.55
Internal Drainage Di	stricts	Area (km²)
Lower Medway		127.11

# WATER QUALITY

Length of Freshwater Ri	ver in NWC Cl	ass (km)
Class	Objective	Achieved 1990 survey
1A Good	0	0
1B Good	3.5	0
2 Fair	6.7	3.5
3 Poor	0	6.7
4 Bad	0	0
Total	10.2	10.2
Number of EC Designat	ed Bathing Wat	ers 4
STWS - Discharges to	Number	Volume (m³/d)
River	3	`717Ó
Estuary	5	36671
Sea	1	120

# **FISHERIES**

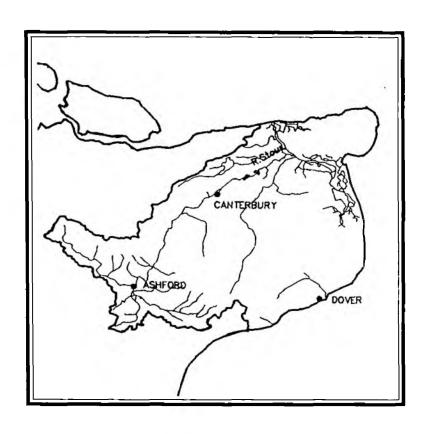
Fisheries (km):	
Freshwater	Tidal
0	0
0	0

# **CONSERVATION**

National Nature Reserves	2
Sites of Special Scientific Interest (SSSIs)	12
Water dependent SSSIs	11
Ramsar and/or Special Protection	
Areas (designated and proposed)	3
Environmentally Sensitive Areas	North Kent
100	Marshes

Length of towpath (km)	0
Length of inland navigation (km)	0

# Stour and East Kent



#### Catchment Area 1080.77 km<sup>2</sup>

#### Geology

North - Tertiary deposits, South - predominantly Chalk with minor Gault Clay and Greensand.

## **Topography**

Maximum: Minimum:

205 m AOD

0 m AOD

#### **Resident Population**

1991 estimate:

452000

2001 estimate: 476400

#### Main Rivers and Streams

Great Stour, Little Stour, Nailbourne, R Dour, Wingham R, East Stour, Aylesford Str, Sarre Penn.

# **ADMINISTRATION**

Kent County Council

1080.8 km<sup>2</sup> within catchment 100 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Ashford	1.6	236	21.8
Canterbury	4.0	252	23.4
Dover	3.3	321	29.7
Maidstone	3.5	17	1.5
Shepway	2.6	141	13.0
Swale	3.1	6	0.6
Thanet	12.0	108	10

Main Towns and population (1991)

Ashford 54200, Canterbury 45600, Deal 29100, Dover 42600, Folkestone 40500, Margate/Broadstairs/Ramsgate 125000, Sandwich 4730.

Rainfall (mm/year) Average 1 in 10 yr drought	Annual 730 575 Tha	Effective 246 125 unet Chalk 40
Auth abst (MI)		134056
% from GW		84%
% high/med loss		88%
Actual abst (MI)		62448
River Flow (cumecs) R Stour	Q50 3.34	Q95 1.56
R Dour	0.32	0.07
Water Supply Reservoirs		None

# WATER QUALITY

Length of F	reshwater Riv	er in NWC Cl	ass (km)
Class		Objective	Achieved
			1990 survey
IA Good		20.5	38.1
1B Good		117.7	71.7
2 Fair		28.6	50.0
3 Poor		0.8	7.8
4 Bad		0	0
	Total	167.6	167.6
Number of	EC designated	l Bathing Wate	ers 12
STWs - Dis	charges to	Number	Volume (m³/d)
River	•	26	52848
Estuary		4	2192
Sea		0	0

# Water Companies Area (km²) in catchment in catchment % Catchment area Mid Kent 442 41 SWS Kent (Thanet) 357 33 Folkestone & Dover 282 26

Resource Areas		
Name	Number	Area (km²)
Stour Marshes	9	173.5
Great Stour	10	171.2
Upper Great Stour	11	233.2
Little Stour	12	285.3
Thanet Chalk	13	76.1
Dover Chalk	14	141.5

# **FISHERIES**

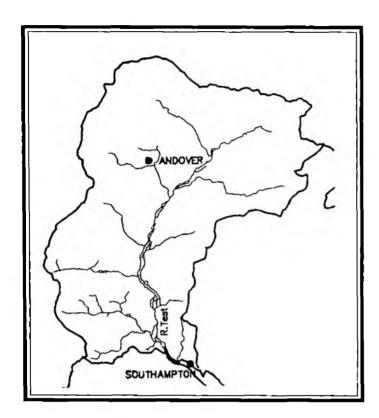
_	_	eries (km): eshwater	Tidal
Cyprinid		26.9	 13.9
Salmonid		0	4.5
CONSERV	ATION		
National Nature	Reserves		2
Sites of Special	Scientific Inte	rest (SSSIs)	34
Water dependent	t SSSIs	, ,	29
Ramsar and/or S	pecial Protect	ion	
Areas (designate	d and propose	:d)	2
•	Sensitive Are	-	

# **FLOOD DEFENCE**

		ength (km)
Coastline	to Schedule 4	80.6
	including main tidal w	aters 80.6
Main River	including tidal lengths	254.58
Sea Defences	NRA responsibility	17.85
	LA responsibility	7.56
Tidal Banks	NRA responsibility	38.05
Internal Drainage Di	stricts	Area (km²)
River Stour (Kent)		119.14

RECREATION AND NAVIGATION		
Length of towpath (km)	0	
Length of inland navigation (km)	0	

# **Test**



#### Catchment Area 1250.32 km<sup>2</sup>

#### Geology

North - predominantly Chalk, South - Tertiary deposits.

# **Topography**

Maximum:

297 m AOD

Minimum:

0 m AOD

# **Resident Population**

1991 estimate:

300000

2001 estimate:

316000

#### **Main Rivers and Streams**

R Test, R Blackwater, Wallop Brook, R Anton, R Dever, R Dun.

#### **ADMINISTRATION**

Hampshire County Council

1057.8 km<sup>2</sup> within catchment 84.6 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Basingstoke	2.3	267	21.4
New Forest	2.1	53	4.2
Southampton	39.5	22	1. <b>8</b>
Test Valley	1.6	592	47.3
Winchester	1.5	124	9. <b>9</b>

Berkshire County Council

8.6 km<sup>2</sup> within catchment 0.7 % of total catchment area

District	Persons	Area (km²)	% Catchment
	per ha	in catchment	area
Newbury	1.9	8.6	0.7

Wiltshire County Council

183.9 km<sup>2</sup> within catchment 14.7 % of total catchment area

 $\begin{array}{ccccc} District & Persons & Area \, (km^2) & \% \, Catchment \\ & per \, ha & in \, catchment & area \\ Kennet & 0.7 & 63 & 5.1 \\ Salisbury & 1.0 & 121 & 9.6 \end{array}$ 

Main Towns and population (1991)

Andover 32325, Romsey 14340, Southampton (part) 199860, Totton 26770.

	-	
Rainfall (mm/year)	Annual	Effective
Average	823	352
1 in 10 yr drought	642	195
70		11 04
Auth abst (Ml)		374063
(245887 Ml is authorised	for fish farming.	This is not
reflected in the actual abst	traction figure.)	
% from GW		21%
70 Hom C W		21,0
% high/med loss		33%
A -41 -14 (MI)		70570
Actual abst (MI)		78570
River Flow (cumecs)	Q50	Q95
R Test	9.95	5.91

Water Companie	es Area (km²)	% Catchment
-	in catchment	area
SWS Hants	925	74
Wessex Water	209	17
SEW, Mid South	hern 74	6
Thames Water	42	3
Resource Areas		
Name	Number	Area (km²)
Lower Itchen (p	art) 31	61.8

Name	Number	Area (km²)
Lower Itchen (part)	31	61.8
Upper Itchen (part)	32 ·	1.6
Lower Test (part)	33	580.5
Upper Test (part)	34	606.4

# **FLOOD DEFENCE**

Water Supply Reservoirs

	Lengt	h (km)
Coastline	to Schedule 4	0
	including main tidal waters	18.4
Main River	including tidal lengths	272.5
Sea Defences	NRA responsibility	0
	LA responsibility	0
Tidal Banks	NRA responsibility	0
Internal Drainage Di	stricts	None

# WATER QUALITY

Length of Freshwater River	in NWC CI	ass (km)
Class	Objective	Achieved
		1990 survey
1A Good	143.5	111.0
IB Good	22.2	124.6
2 Fair	97.0	23.1
3 Poor	0	4.0
4 Bad	0	0
Total	262.7	262.7
Number of EC Designated Bathing Waters  STWs - Discharges to Number Volume (		
River	51	32679
Estuary	2	54970
Sea	0	0

# **FISHERIES**

None

Freshwater		lidai
0		0
103.53		0
N.T		
N		
<b>,</b>		0
Interest (SSSIs)		30
		26
otection		
oposed)		l
	0	0 103.53

Length of EC Designated Fisheries (km):

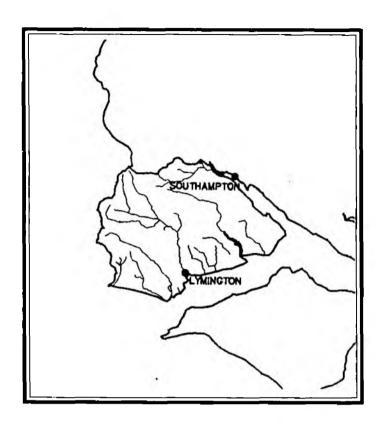
Environmentally Sensitive Areas

# **RECREATION AND NAVIGATION**

Length of towpath (km)	0
Length of inland navigation (km)	0

Test Valley

# West Hampshire



Catchment Area 450.49 km<sup>2</sup>

Geology

Tertiary deposits.

**Topography** 

Maximum:

114 m AOD

Minimum:

0 m AOD

**Resident Population** 

1991 estimate:

97000

2001 estimate:

105000

**Main Rivers and Streams** 

Main Towns and population (1991)

Lymington and Pennington 13405.

R Beulieu, R Lymington.

# **ADMINISTRATION**

Hampshire County Council

449.8 km2 within catchment 99.8 % of total catchment area

District

Persons per ha

Area (km2) in catchment % Catchment

**New Forest** 

2.1

449.8

area

99.8

**Dorset County Council** 

0.75 km<sup>2</sup> within catchment 0.2 % of total catchment area

District

Christchurch

Persons

Area (km²)

% Catchment

per ha

8.1

0.75

in catchment

area

0.2

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Rainfall (mm/year) Average 1 in 10 yr drought	Annual 833 649	Effective 324 203
Auth abst (Ml)		2449
% from GW		65%
% high/med loss		89%
Actual abst (Ml)		838
River Flow (cumecs)	Q50	Q95
R Lymington	0.44	0.05
Water Supply Reservoirs		None
Water Companies	Area (km²)	% Catchment
in	catchment	area
Bournemouth & West Hants	s 261.5	58
SWS Hants	189.0	42

Resource Areas		
Name	Number	Area (km²)
Lower Test (part)	33	37.6
New Forest	35	412.9

# FLOOD DEFENCE

Coastline	Ler to Schedule 4 including main tidal water	75.0 ers 108.3
Main River	including tidal lengths	115.27
Sea Defences	NRA responsibility LA responsibility	10.47 2.94
Tidal Banks	NRA responsibility	0
Internal Drainage Districts		None

# WATER QUALITY

Length of Freshwater Riv	er in NWC CI	ass (km)
Class	Objective	
		1990 survey
1A Good	,45.1	89.1
1B Good	110.8	88.6
2 Fair	34.4	12.6
3 Poor	0	0
4 Bad	0	0
Total	190.3	190.3
Number of EC Designate	d Bathing Wat	ers 5
STWs - Discharges to	Number	Volume (m³/d)
River	20	1168
Estuary	20	3535
Sea	0	0

# **FISHERIES**

Length of I	EC De	signate	ed Fisheries (km):	
			Freshwater	Tidal
Cyprinid		-	0	0
Salmonid			17.83	0

# **CONSERVATION**

National Nature Reserves	1
Sites of Special Scientific Interest (SSSIs)	13
Water dependent SSSIs	13
Ramsar and/or Special Protection	
Areas (designated and proposed)	1
Environmentally Sensitive Areas	

Length of towpath (km)	0
Length of inland navigation (km)	0

# **Appendix**

#### General and Administration

Map Scales - Region 1:1 000 000, Catchments 1:600 000.

Catchment Area - from 1:100 000 and 1:50 000 maps.

Topography m AOD - metres above ordnance datum. From Institute of Hydrology gauging station data sheets (1989).

Resident Population - 1991 figure derived from Registrar General's provisional mid-1991 estimates. 2001 figure derived from 1990 NRA demand forecast review. Using data by District/Borough/City Council, catchment population has been estimated as a percentage of Council area within each catchment. Adjustments have been made for population concentrated in main towns.

County and District Councils - area from 1:250 000 map. Persons per ha (hectare) from OPCS 1991 County Moni-

Main Towns - towns recorded by Ordnance Survey as over 2km<sup>2</sup> in area. Town population - estimate of 1991 population from County and District Councils.

#### Water Resources

Rainfall, Effective - total rainfall minus actual evapotranspiration. 1 in 10 yr drought - drought with a statistical probability of occurring once in a 10 year period.

Authorised Abstraction - annual figure as at March 1993. Saline water abstraction is excluded from all abstraction data shown. All abstraction data given +/- 5% confidence.

% from GW - percentage of authorised abstraction from groundwater.

% high/med loss - percentage of authorised abstraction in high and medium loss factor categories (1993 Scheme of Abstraction Charges). Indication of consumptive use.

Actual Abstraction - for water year Oct 1990 to Sept 1991.

Q50/Q95 - flow exceeded for 50/95% of the flow record. On 1 day duration. Calculated from archived flow records. Measured at downstream catchment gauges located at:

E Adur

- Sakeham

W Adur - Hatterrell

Lukely - Newport

Wallers - Boreham Br.

Ouse Arun - Barcombe Mills - Pallingham

Cuckmere

- Shermans Br.

Darent

E Rother

- Hawley

IoW Medina - U Shide

- Udiam

IoW E Yar - Alverstone

Itchen

- Allbrook & Highbridge

Medway

- Teston

Meon Stour

- Mislingford - Plucks Gutter

Hamble - Frogmill Dour - Crabble Mill

Test

- Broadlands

Lymington

- Brockenhurst

Reservoirs - area from Water Authority leaflet (1985).

Water Companies - area from 1:250 000 map.

#### Flood Defence

Coastline - from 1:25 000 map along mean high water mark and Schedule 4 boundary (Coast Protection Act 1949, plus 1990 Portsmouth, Chichester and Langstone Harbour revisions). Second figure includes main tidal waters above Schedule 4 boundary (Thames Estuary, Medway Estuary, Swale and Southampton Water).

Main River - sum of tidal and non tidal main river lengths.

Sea Defences/Tidal Banks - from National Sea Defence Survey. Sea defences under private/military responsibility are not shown by catchment.

#### Water Quality

NWC - National Water Council.

STWs - Sewage Treatment Works. Data shown relates to works with discharge volumes in excess of 5m<sup>3</sup>/d.

#### **Fisheries**

Salmonid - Salmon Salmo salar, Brown and Sea Trout Salmo trutta and Rainbow Trout Salmo gairdneri. Cyprinid - all non-salmonid freshwater fish.

#### Conservation

SSSIs and Ramsar/SPAs - sites that straddle catchment boundaries have been recorded in both/all catchments except Southampton Water/Solent Marshes Ramsar site/ SPA which is only included in the Regional total.

Water dependent SSSIs - sites where operations that involve a change of water levels/tables or water utilization require prior consultation with English Nature. These are included in the total number of SSSIs shown.

#### **Recreation and Navigation**

Inland navigation - navigation above the tidal limit.

LA/Other - Local Authority or other body responsible for maintenance etc.