

Appendix 1 Special Tribunal Draft Order

Water Conservation (Rangitata River) Order

1 TITLE

This order is the Water Conservation (Rangitata River) Order 2002.

2 COMMENCEMENT

This order comes into force on the 28th day after the date of its notification in the Gazette.

3 INTERPRETATION

In this order, unless the context otherwise requires, -

Act means the Resource Management Act 1991.

Reasonable mixing means the mixing that occurs:

- (a) Within a maximum radius of 200 metres from a discharge into a still water body; or
- (b) Within a maximum distance of 200 metres downstream from a discharge into a river.

"River" means the mainstem of those waters identified in the Schedules to this Order. The mainstem shall be the river with that name on the Infomap 260 series topographical maps between specified lower and upper limits as defined by map references in the Schedules to this Order.

Tributaries means all the tributaries of the rivers or sections of rivers identified in Schedules 1, 2 and 3.

"Klondyke" means the site of the water level recorder on the Rangitata River at or about J36 666149

4 OUTSTANDING CHARACTERISTICS AND FEATURES

The waters specified in either Schedule 1, 2 or 3 include or contribute to, to the extent identified in Schedule 1 2 or 3, the following outstanding characteristics, features, and values:

- (a) amenity and intrinsic values;
- (b) habitat for terrestrial and aquatic organisms;
- (c) fishery values;
- (d) wild, scenic and other natural characteristics;
- (e) scientific and ecological values;
- (f) recreational, historical, spiritual or cultural characteristics;
- (g) significance in accordance with tikanga Māori.

5 WATERS TO BE RETAINED IN NATURAL STATE

Because of the outstanding characteristics, features, and values identified in clause 4, the quality, quantity, level and rate of flow of the waters specified in Schedule 1 are to be retained, as far as possible, in their natural state.

6 WATERS TO BE PROTECTED

Because of the outstanding characteristics, features, and values identified in clause 4, the waters specified in Schedule 2 are to be protected in accordance with the relevant conditions in clauses 8 to 11, as specified in Schedule 2.

7 WATERS TO BE PROTECTED AS CONTRIBUTING TO OUTSTANDING FEATURES

Because of their contribution to outstanding characteristics and features identified in clause 4, the waters specified in Schedule 3 are to be protected in accordance with the relevant conditions in clauses 8 to 11, as specified in Schedule 3.

8 RESTRICTIONS ON DAMMING OF WATERS

- (1) No resource consent may be granted or rule included in a regional plan permitting the damming of the waters specified in Schedule 2. For the purposes of this clause, damming does not include any intake or deflection structure that does not -
 - (a) Prevent the passage of any salmon; or
 - (b) Reduce the use of the waters for rafting or canoeing; or
 - (c) Reduce the aquatic bird habitat; or
 - (d) Intrude visually to the extent that it reduces wild and scenic values.
- (2) No resource consent may be granted or rule included in a regional plan permitting the damming of the waters specified in Schedule 3, whenever that Schedule refers to this clause, if that will cause, either by itself or in combination with any other existing consents or rules, -
 - (a) Material alteration of the naturally occurring sediment delivery to the mainstem Rangitata River; or
 - (b) Reduction of the aquatic bird habitat.
- (3) This clause does not apply to the maintenance of existing rock weirs and river works to the same level and extent as occurring as at 1 January 2000 or to the placing of raw rock works and the carrying out of river engineering works necessary for flood and asset protection purposes.

9 RESTRICTIONS ON ALTERATIONS OF RIVER FLOWS AND FORM

- (1) No resource consent may be granted or rule included in a regional plan –
 - (a) that will cause the material alteration of the channel cross-section, or meandering pattern, or braided river channel characteristics of the form of any river specified in Schedule 2;
 - (b) the restriction in clause (1)(a) does not apply in respect of dams, weirs, roads, fords, bridges, access ways, or fish passes lawfully existing on the date this order comes into force.
- (2) No resource consent may be granted or rule included in a regional plan –
 - (a) permitting the abstraction of water from any part of the Rangitata River specified in items 1,2,3 & 6 of Schedule 2;
 - (b) that will cause, either by itself or in combination with any other existing consents or rules, alteration of the naturally occurring instantaneous flow of water at Klondyke -
 - (i) by more than 2% when the naturally occurring flow at Klondyke is less than or equal to 110 m³/s; or
 - (ii) by more than 12% when the naturally occurring flow at Klondyke is greater than 110 m³/s.
 - (c) that will cause, either by itself or in combination with any other existing consents or rules, alteration of the naturally occurring instantaneous flow of water in any river specified in item 2 of Schedule 3 –
 - (i) by more than 15% when the naturally occurring flow at Klondyke is less than or equal to 110 m³/s; or
 - (ii) by more than 30% when the naturally occurring flow at Klondyke is greater than 110 m³/s.
 - (d) that will cause, either by itself or in combination with any other existing consents or rules, total abstraction from any part of the Rangitata River specified in Schedules 1, 2 or 3 –
 - (i) to exceed a maximum of 33 m³/s unless the naturally occurring flow at Klondyke exceeds 110 m³/s; or
 - (ii) to exceed a maximum of 43 m³/s unless the naturally occurring flow at Klondyke exceeds 120 m³/s; or
 - (iii) to exceed a maximum of 53 m³/s when the naturally occurring flow at Klondyke flow exceeds 120 m³/s.
 - (iv) no sharing of flows is required for the additional abstractions permitted by clauses (2)(d)(ii) and (iii).
 - (e) that will cause, either by itself or in combination with any other existing consents or rules, less than 28 m³/s of the total allowable abstraction to be available for one continuous take. (Note: continuous except for periodic, programmed maintenance shutdowns)
 - (f) if the effect is that the number of takes from those parts of the Rangitata River specified in items 4 and 5 of Schedule 2 is greater than a maximum of three.

- (3) For the period from 15 September to 14 May in the following year, there shall be a flow management regime in respect of the main stem of the Rangitata River comprising -
 - (a) a minimum flow of 20 m³/s; and
 - (b) when the flow at Klondyke is greater than 30 m³/s but less than 40 m³/s up to 10 m³/s shall be available to be taken, increasing incrementally to a maximum of 20 m³/s when the flow reaches 40 m³/s; and
 - (c) when the flow at Klondyke is greater than 40 m³/s but less than 110 m³/s, up to 33 m³/s may be taken, on the basis of a 1:1 sharing between instream retention and water abstraction; and
- (4) For the period 15 May to 14 September each year, there shall be a flow management regime in respect of the main stem of the Rangitata River comprising –
 - (a) a minimum flow of 15 m³/s; and
 - (b) when the flow at Klondyke is greater than 30 m³/s but less than 40 m³/s up to 15 m³/s shall be available to be taken, increasing incrementally to a maximum of 25 m³/s when the flow reaches 40 m³/s; or
 - (c) when the flow at Klondyke is greater than 40 m³/s but less than 110 m³/s, up to 33 m³/s may be taken, on the basis of a 1:1 sharing between instream retention and water abstraction.
- (4) No resource consent may be granted or rule included in a regional plan that will cause, either by itself or in combination with other existing consents or rules, including existing surface and groundwater takes, reduction of the naturally occurring instantaneous flow in McKinnons Creek at Wallaces Bridge (map reference K38:887-716) below a minimum flow of 300 l/s.
- (5) The restrictions in clauses (2) - (4) do not apply in respect of any waters specified in item 3 of Schedule 6 that are not hydraulically connected to the Rangitata River or its tributaries.

10 REQUIREMENT TO MAINTAIN FISH PASSAGE

- (1) No resource consent may be granted or rule included in a regional plan relating to the waters identified in Schedule 2, that will adversely affect the passage of salmon, where Schedule 2 identifies salmon passage or salmon spawning as an outstanding characteristic or contributing to an outstanding characteristic.
- (2) No resource consent in relation to an intake site may be granted for the waters specified in Schedule 2 unless that resource consent prohibits fish from entering the intake as far as is reasonably practicable.

11 RESTRICTIONS ON ALTERATION OF WATER QUALITY

- (1) No resource consent may be granted or rule included in a regional plan permitting a discharge into any of the waters identified in Schedules 2 or 3 at any time, if, after allowing for reasonable mixing of the discharge with the receiving waters, the discharge will alter the natural temperature of the receiving water by more than 3 degrees Celsius provided that the alteration does not increase the water temperature to more than 20 degrees Celsius.
- (2) No resource consent may be granted or rule included in a regional plan permitting a discharge into any of the waters identified in Schedule 2 or Schedule 3, unless, after allowing for reasonable mixing of the discharge with the receiving waters, any change in the acidity or alkalinity in the receiving waters, attributable to that discharge, maintains the pH within the range of 6 to 9 units.
- (3) No resource consent may be granted or rule included in a regional plan permitting a discharge into any of the waters identified in Schedule 2 or Schedule 3, unless, after allowing for reasonable mixing of the discharge with the receiving waters, -
 - (a) There will be no undesirable biological growths attributable to the discharge, including, but not limited to the following: –
 - (i) Bacterial and/or fungal slime growths that are visible to the naked eye; and/or
 - (ii) Seasonal maximum covers of streams or river beds by:–
 - I periphyton as filamentous growth or mats (longer than 20 millimetres) exceeding 30%; and/or
 - II biomass exceeding 120 milligrams of chlorophyll-*a* per square metre; and/or
 - III 35 grams ash-free dry weight per square metre of exposed surface area; and
 - (b) aquatic organisms shall not be rendered unsuitable for human consumption through the accumulation of excessive concentrations of contaminants; and/or
 - (c) the water is not made unsuitable for contact recreation by the presence of contaminants, or the median bacterial level of 5 samples or more taken over a period of 30 days shall not exceed 126 *E. coli* per 100 millilitres.
- (4) No resource consent may be granted or rule included in a regional plan permitting a discharge into any of the waters identified in Schedule 2 or Schedule 3 if, after allowing for reasonable mixing with the receiving waters, the discharge will reduce the concentration of dissolved oxygen below 80% of saturation.

12 SCOPE OF ORDER

- (1) This order does not limit section 14 (3)(b) and (e) of the Act relating to the use of water for domestic needs, for the needs of animals, and for, or in connection with, fire-fighting purposes.
- (2) This order does not restrict or prevent the grant of water or discharge permits to the Department of Conservation or rules being included in a regional plan that will permit minor water uses if those minor uses are necessary for the management of land administered by the Department.
- (3) This order does not restrict or prevent the grant of resource consents for the purpose of -
 - (a) Research into, and enhancement of, fisheries and wildlife habitats; or
 - (b) Hydrological or water quality investigations; or
 - (c) The construction, removal, maintenance or protection of any road, ford or bridge, or the maintenance and protection of any network utility operation (as defined in section 166 of the Act); or
 - (d) The construction and maintenance of soil conservation and river protection works undertaken pursuant to the Soil Conservation and Rivers Control Act 1941.
- (4) This order does not prevent the management of flow abstractions above the minimum flow in a stepped manner according to published operating schedules.
- (5) This order does not prevent the granting of further resource consents for the Rangitata Diversion Race on similar terms and conditions to those imposed on the resource consents held on the date this order comes into force.

13 EXEMPTIONS

- (1) Nothing in this order prevents the grant of a resource consent that would otherwise contravene the conditions set out in Clauses 8 to 11 if -
 - (a) A consent authority is satisfied that –
 - (i) there are exceptional circumstances justifying the grant of the permit; or
 - (ii) the permit is for a discharge that is of a temporary nature; or
 - (iii) the permit is for a discharge that is associated with necessary construction and maintenance work relating to works and structures not otherwise prohibited by this Order; and
 - (b) the exercise of any such resource consent would not compromise the preservation and protection of the outstanding characteristics and features identified for the waters specified in the Schedules.

Schedule 1 Waters to be retained in natural state

All map references are to Infomap 260 series

Item	Waters	Outstanding characteristics or features	Conditions to apply
1	Clyde River and all tributaries	Amenity and intrinsic values Indigenous plant communities Wild and scenic and other natural characteristics Significance for Ngāi Tahu	Natural state
2	Havelock River and all tributaries	Amenity and intrinsic values Indigenous plant communities Wild and scenic and other natural characteristics Significance for Ngāi Tahu	Natural state

Schedule 2 Protected waters

All map references are to Infomap 260 series

Item	Waters	Outstanding Characteristic or Features	Conditions to apply
1	Rangitata River main stem from confluence with Clyde and Havelock Rivers to the top of the gorge (at or about J36: 636-174) “upper Rangitata”	Waters in a natural state Amenity and intrinsic values Habitat for aquatic birds Aquatic macro-invertebrates Salmon spawning & salmon passage Salmon fishing Wild, scenic and other natural characteristics Indigenous plant communities Spiritual, cultural & historical values Rafting, canoeing and jet-boating Significance for Ngāi Tahu	Clauses 6, 8(1), 8(3), 9(1), 9(2)a, 10, and 11.
2	Rangitata River main stem from to the top of the gorge (at or about J36: 636-174) to the water level recorder at Klondyke (at or about J36:666-149) “the gorge”	Waters in a natural state Amenity and intrinsic values Wild, scenic and other natural characteristics Indigenous plant communities Rafting, canoeing Significance for Ngāi Tahu Contributes to salmon spawning & salmon passage	Clauses 6, 8(1), 8(3), 9(1), 9(2)a, 10, and 11

Schedule 2 Protected waters (continued)

3	<p>Unnamed tributaries of the Rangitata River and other water bodies adjacent to the Rangitata River joining the Rangitata River at or about J36 390316 and known as Brabazon Fan; J36 348379 and known as Black Mountain Stream; J36 414330 and known as Deep Creek (Mt Potts); J36 460242 and known as Deep Stream (Mesopotamia).</p>	Salmon spawning	<p>Clauses 6, 8(1), 8(3), 9(1), 9(2)a, 10, and 11.</p>
4	<p>Rangitata River from map reference (at or about J36:666-149) to SH 72 bridge at Arundel</p>	<p>Salmon fishing Salmon passage Water-based recreation Significance for Ngāi Tahu</p>	<p>Clauses 6, 8(1), 8(3), 9(1), 9(2)(d),(e),(f), 9(3), 9(4), 10, and 11.</p>
5	<p>Rangitata River from SH 72 bridge at Arundel to coast.</p>	<p>Aquatic bird habitat Salmon passage Salmon fishing Spiritual & cultural values Significance for Ngāi Tahu</p>	<p>Clauses 6, 8(1), 8(3), 9(1), 9(2)(d),(e),(f), 9(3), 9(4), 10, and 11.</p>
6	<p>Unnamed tributary known as Ealing Springs Stream joining Rangitata River at or about K37 824831</p>	<p>Salmon spawning Significance for Ngāi Tahu</p>	<p>Clauses 6, 8(1), 8(3), 9(1), 9(2)a, 10 and 11.</p>
7	<p>Unnamed tributary known as McKinnons Creek joining Rangitata River at or about K38 893702</p>	<p>Salmon spawning Significance for Ngāi Tahu</p>	<p>Clauses 6, 8(1), 8(3), 9(1), 9(2)(d),(e), 9(3), 9(4), 9(5), 10, and 11.</p>

Schedule 3 Waters to be protected for their contribution to the above mentioned outstanding features

All map references are to Infomap 260 series

Item	Waters	To maintain	Conditions to apply
1	All tributaries of the Rangitata River from the Clyde/Havelock confluence to the water level recorder at Klondyke (at or about J36:666-149) except those otherwise referred to in Schedules 1, 2 or 3.	Adequate water of sufficient quality for the outstanding aquatic bird habitat; braided river characteristics, salmon spawning & juvenile habitat, rafting and canoeing, aquatic macro-invertebrates, indigenous riverbed plants, and significance for Ngāi Tahu	Clauses 7, 8(2), 8(3), 9(2)(b),(d),(e), 9(3), and 11.
2	All tributaries of the Rangitata River from the water level recorder at Klondyke (at or about J36:666-149) to the sea except those otherwise referred to in Schedules 1, 2 or 3.	Adequate water of sufficient quality for the outstanding aquatic bird habitat; braided river characteristics, salmon fishery, rafting and canoeing, aquatic macro-invertebrates, and significance for Ngāi Tahu	Clauses 7, 8(2), 8(3), 9(2)(c),(d),(e), 9(3), 9(4), and 11.
3	Shallow groundwater within 15 m below the ground and less than 1000 m either side of <ul style="list-style-type: none"> a) the main river downstream from Klondyke (at or about J36:666-149) b) the unnamed tributary known as McKinnons Creek joining Rangitata River at or about K38 893702 c) the unnamed tributary known as Ealing Springs Stream joining Rangitata River at or about K37 824831 	Adequate water in the Rangitata River and tributaries for the outstanding aquatic bird habitat; braided river characteristics, salmon fishery, rafting and canoeing, aquatic macro-invertebrates, and significance for Ngāi Tahu.	Clauses 7, 9(2)(c),(d),(e), 9(3), 9(4), 9(5), and 9(6).

Appendix 2 List of Submitters

The list of submitters is not included in this version.

Appendix 3 List of Witnesses

Date of appearance	Submitter	Witnesses
3 - 5 October 2001	Applicant - Stephen Christensen (counsel)	Bryce Johnson Jay Graybill Keith Hovell Frank Scarf Mark Webb Martin Unwin Ian Jowett Bruce Digby Basil Sharp Geoff Kerr Bryan Strange Gordon Glova John Stark
8 October 2001	Te Rūnanga O Ngāi Tahu and Arowhenua (1070)	Bob Penter
	South Rakaia Bach Owners (902)	D B Banwell
	D B Banwell	
	Ken Banwell (tabled)	
	Karen Banwell (tabled)	
	Steven Osborne (527)	
	John Wilkie (not written) (320)	
	Michael Moore (653)	
	David Johnstone (not written) (53)	
	Frank Scarf (362)	
	Anna Williams (899)	Ian Logie (appeared 29/10/01)
	Watson-Howden Family (20, 164, 165, 679, 681, 736, 676, 677, 678, 688)	Ian Watson (736)
	South Canterbury Branch, Royal Forest and Bird Protection Society NZ Inc (881)	Fraser Ross (199)
	Edith Smith (526)	

Date of appearance	Submitter	Witnesses
9 - 10 October 2001	Ashburton/Rangitata Instream Users Group (496), Nth Rangitata Huts, Sth Rangitata Reserve (338), Canterbury Anglers Club (520), Save the Rivers Mid Canterbury , Canterbury Fly Fishing Club Inc, Ashburton Club and M.S.A (Fishing and Game section),	Frank Hamilton (894) Matthew Hall (290) and Family (65, 846) Karen Hall (922) Matthew Hall Junior (953) Martyn Baker (345) Marian Baker (54) Trevor Isitt (387) Terry Crum (529) Clive Gilbert (849) Peter J Boulton (659) and Family (593, 660) Andrew Boulton (592) Jeremy Boulton Christopher Burt (779) John Ell (319) Robert J Mortimer (880) Terry Oakshott (tabled) (335) Tony FitzGerald (479) Geoff Bailey Sefton Gray Alan Cooper (257) Jeremy Walton (120) Fred Van Slooten (493) Robert Metcalf (215) Henry Hill (261) Ian Parkin (599) Ian Watson (736) Murray Lane (557) Cyril Cousins (62) David McPhail (read by John Blanchfield (549))
10 October 2001	New Zealand Salmon Anglers Association Inc (789)	Neville Ellis
	B W Badland (377)	
	Friends of the Earth NZ Ltd (728)	Thomas Hay
	South Canterbury Anglers Club Inc (244)	E V Davidson
	Women Stepping Outdoors (713)	Debbie Martin Sheryl Thompson David Martin

Date of appearance	Submitter	Witnesses
	John Hooper (108)	
11 October 2001	Philippa Grigg (86)	
	Gary Rooney (883)	
	Mark Webb (441)	
	Ryan Parkin (706)	
	Ian Parkin (599)	
	Kevin Frazier (906)	
	South Canterbury Branch of New Zealand Salmon Anglers Association (318)	Grant Ivey (316) Philip De Joux (750) David Loomes (310)
	Richard Muhl (571)	
	Susan Rapach (570)	
	John Hodgson (747)	
	Alexander Furness (399)	
	Alan Brookes (875)	
	Jacqueline Russell (796) (read by V Lynn)	
	Vaughan Lynn (797)	
	Rex Hobbs (735)	
12 October 2001	Tinaka Enterprises (685)	Peter Shutt George Anderson (11) Richard Taylor Kevin Payne (652)
	Payne Family (492, 616, 656)	Kevin Payne (652)
	Ross Millichamp (916)	
	Maurice Pentecost (317)	
	Rex Whiting (323)	
	de Joux family (58, 576, 750, 791)	Steven de Joux (791) Phil de Joux (750)
	Kit Silcock (552)	
29 October 2001	Director General of Conservation (1002) - Evan Alty (counsel)	Mike Cuddihy Colin O'Donnell Ken Hughey Martin Rutledge David Stewart Stephen Baker (appeared 6/11/01) Di Lucas (appeared 6/11/01)
	Ministry of Agriculture and Forestry (996)	Grant McFadden John Bright
30 October – 1 November 2001	Environment Canterbury (714) – Malcolm Stewart-Wallace (counsel)	Richard Johnson Alan Rackham Shirley Hayward Warwick Pascoe Maurice Duncan

		Paul Mosley Christina Robb Craig Mason
2 November 2001	Royal Forest and Bird Protection Society Inc (1060) (representing Central Office, Ashburton, Marlborough (176), Golden Bay (490), Dunedin (162), Nelson/Tasman (413), Kapiti (457), Thames/Hauraki (1056), Te Puke (259), Wairoa (1072) Branches) – Kate Mitcalfe (counsel)	Peter Howden (688) Edith Smith (526) Eric Pyle Mark Davis Scott Butcher Frances Schmechel
	Geoffrey Newton (1116)	
	Alan Taggart (704)	
	Stack Family (761)	Daniel Stack
	Ray Prouting (not written) (609)	
	Robyn McKenzie (1134)	
6 November 2001	W G and L A Burdon (202) and Pecora Farms Ltd (746)	W G Burdon (202)
	Whiterock Enterprises Ltd (717) & J & N Ecroyd (870, 872)	J Ecroyd (870)
	Mayfield Hinds Irrigation Society Ltd (578)	Alan Taggart (704) Stuart Wilson Wyvern Jones David Keeley (756) Mark Slee
	Central Plains Water (491)	Walter Leuthwaite
	New Zealand Jet Boat Association (1022)	Katie James
	Guy Mannering (361)	
	Rangitata Gorge Landcare Group (515)	Don Prouting (718)
	Mt Peel Station (446)	Rosemary Acland
	D A and H F Prouting (718)	
7 November 2001	Rangitata South Irrigation Ltd (436)	Ian Morten (125) Peter Callander David Attewell
	Ruapuna Irrigation Ltd (987)	Robert McDowell

Date of appearance	Submitter	Witnesses
8 November 2001	New Zealand Recreational Canoeing Association (1015) Maree Baker (counsel)	Dr Douglas Rankin Wayne Keenan Sue Harrison South (71) Jonathon Hunt Warren Gualter Maree Baker Ian Logie Michael Barnes (tabled) Linda Wensley (tabled)
	Timaru Civic Trust (1026)	Tony Sleigh
	Murray Turley (727)	
9 November 2001	Ashburton Lyndhurst Irrigation Society Ltd (1012)	George Brown Andy MacFarlane Will Nixon Barry Croucher
	Beverley Tasker (1122)	
	Rupert Curd (687)	
	John Cocks (763)	
	Bryan Beeston (427)	
	Greenstreet Irrigation Society Ltd (547)	Stuart Walkham
	Alastair Studholme (940)	
	Laurence and Malcolm Prouting	Laurence Prouting
	Russel Lister (707)	
	Alan Turley (726)	
	Malcolm Lill (915)	
	Colin Bryant (759)	
	Thomas Corbett (982)	
	Ben Mcleod Station (751)	Donald Aubrey
26 November 2001	Federated Farmers of Mid Canterbury (757)	Stuart Wilson
	Meat and Fibre Section Federated Farmers Mid Canterbury (1013)	T D Wilkinson
	Donald McFarlane (752)	
	Canterbury Aoraki Conservation Board (1003)	Alan Joliffe
	New Zealand Federation of United Seafood Interests Inc (503)	Bevan Wilkie
	New Zealand Vegetable and Potato Growers Federation (tabled) (930)	

Date of appearance	Submitter	Witnesses
27, 29, 30 November 2001	Rangitata Diversion Race Management Limited (1014) and Trustpower New Zealand Limited (966) – Nicholas Davidson QC and Rachel Dunningham (counsel)	John Young Ian Lees Richard de Joux Henry Hudson Greg Ryder Donald Jellyman Jim Jolly Basil Ivey Bob Engelbrecht Roger Burchett Kelvin Sanderson David Lowe Robert Batty
6 December 2001	Forest Creek Station (421) – Amanda Douglas (counsel)	Doug Harpur
	Ashburton River Irrigation Association Incorporated (762)	Ron Cocks
	Mark Lemon (691)	
	Ashburton Community Water Trust (927)	A D Argyle John Bright
7 December 2001	Rangitata Sustainable Trust (754)	Nigel Gormack Dave Attewell
	Mid Canterbury Irrigation Enhancement Society (697)	Mark Lemon (691) Will Nixon Alan Pickens
8 December 2001	James Jolly (898)	
	Ashburton District Council (925), Timaru District Council (425), T & J Johnson (388, 396), Pye Partnership (437) – Philip Milne (Counsel)	Murray Anderson Michael Singleton Geoff Butcher Stuart Ford Wynn Raymond Fiona Eunson Trevor Johnson (388) Leighton and Diana Pye (437) (tabled)
11 – 12 December 2001	Federated Farmers of New Zealand Inc (939), Combined Canterbury Provinces, Rangitata Community Catchment Group (890), South Canterbury Federated Farmers (1000?)	Pam Richardson Tom Lambie Ivon Hurst Jacob Haronga Tim Mutter Tom Henderson (725) Bob Douglas Alison Undorf-Lay Andrew Hume Allan Andrews

Appendix 4 Abbreviations, symbols and terms

Abbreviations and symbols

ANZECC	Australian and New Zealand Environment Conservation Council
BOD	Biological Oxygen Demand
CMA	Coastal Marine Area (defined in RMA)
CSI	Central South Island Fish and Game Council
DoC	Department of Conservation
ECan	Environment Canterbury (Canterbury Regional Council)
FTE	When referring to jobs/employment - full time equivalent workers
l/s	litres per second
MAF	Ministry of Agriculture and Forestry
m	metre
m ³ /s	cubic metres per second
NRRP	Environment Canterbury's draft Natural Resources Regional Plan
NTU	Nephelometric Turbidity Units
RDR	Rangitata Diversion Race
RPS	Canterbury Regional Policy Statement (ECan)
RMA	Resource Management Act 1991
SSWI	Sites of special wildlife importance (a national inventory undertaken in the 1980s by the Wildlife Service)

Definition of terms

Abstraction	in relation to a water body, means the taking of water from that water body.
Amenity values	as defined in RMA Section 2: <i>"Amenity values means those natural or physical qualities and characteristics of an area that contribute to people's appreciation of its pleasantness, aesthetic coherence, and cultural and recreational attributes."</i>
Braided River	any river with multiple successively divergent and rejoining channels separated by gravel islands
Dam	to create any kind of temporary or permanent barrier to water
Ecosystem	plants, animals, their physical environment, and the dynamic processes that link them
Intrinsic values	as defined in RMA Section 2: <i>"Intrinsic values in relation to ecosystems, means those aspects of ecosystems and their constituent parts which have value in their own right, including – Their biological and genetic diversity; and The essential characteristics that determine an ecosystem's integrity, form, functioning, and resilience."</i>
Mauri	essential life force or principle; a metaphysical quality inherent in all things
Mahinga Kāi or Mahi <u>ka</u> Kāi	the customary gathering of food and natural materials and the places where these resources are gathered (Ngāi Tahu Claims Settlement Act 1998)
Ngāi Tahu and	the collective of the individuals who descend from the primary

Ngāi Tahu Whānui	hapū of Waitaha, Ngāti Mamoe, and Ngāi Tahu, namely, Kāti Kuri, Kāti Irakehu, Kāti Huirapa, Ngāi Tuahuriri, and Kāi Te Ruahikihiki (Ngāi Tahu Claims Settlement Act 1998)
Periphyton	The term "periphyton" refers to the slimy growth (sometimes in long strands) often found on stones and other surfaces on the stream bed. Periphyton consists mainly of algae which are simple plants.
Stream depletion factor (sdf)	is a factor, measured in units of days, giving an indication of degree of connection between a well and a stream. The sdf is inversely related to the degree of connection, i.e., a low stream depletion factor indicates good connection.
Tangata whenua or	as in RMA – in relation to a particular area, means the iwi, or hapū
Takata whenua	that holds mana whenua over that area

Appendix 5 Maps

Maps are not included in this version.