Articles

Acronyms, acronyms everywhere... Water players and programmes in the Selwyn/Christchurch area Hamish G. Rennie and Adrienne Lomax*

Disclaimer: Due to the temporary nature of website locations, the LPR editorial team cannot guarantee the functionality of all hyperlinks in the following articles, beyond the date this issue was released.

The interface of traditional town planning and the "new" environmental planning is potentially problematic and this is especially apparent in the integrated and sustainable use of water resources in Canterbury. It is easy to find yourself drowning in a flood of watery acronyms and programme names when you engage with water planning issues. This article explains the key acronyms in the management of our water resources, provides a practical outline of planning instruments affecting water use/ decisions, sets out who is managing and planning for water in the Christchurch City and Selwyn District Councils (Fig. 1) and concludes with a comment on the major planning implications for the profession and academia. Ecosystem restoration programmes, not necessarily engaged with water, are not addressed here, nor are several research projects or groups with advocacy as their primary focus.

Key organisations

The key agencies/groups working with water in this area are: the Canterbury Regional Council (aka Environment Canterbury(ECan)), Te Runanga o Ngai Tahu (TRoNT), the Christchurch City Council (CCC) (which includes the former Banks Peninsula District Council), the Selwyn District Council (SDC), the Waihora Ellesmere Trust (WET), the Avon-Heathcote Estuary Ihutai Trust, Fish and Game New Zealand (F&GNZ), the Ministry for the Environment (MfE), the Department of Conservation (DoC), the Ministry of Fisheries (MFish), the National Institute for Water and Atmospheric Research (NIWA), Landcare Research, Lincoln University (LU) and its Land Environment and People Research Centre (LEaP), Canterbury University (UC), Lincoln Ventures Ltd (LVL), the Ministry of Agriculture and Forestry (MAF). Surprisingly, despite its mandate, the Canterbury Aoraki Conservation Board plays a very limited role in water management issues in this part of its region.

National instruments and activities

The <u>National Environmental Standard (NES) for Sources of</u> <u>Human Drinking Water</u> came into effect in June 2008 with the intention of reducing the risk of contamination of drinking water sources such as groundwater and rivers. It requires regional councils to ensure that effects on drinking water are considered in regional plans and when making decisions on resource consents.

The MfE has also produced a discussion document outlining a proposed <u>NES on Ecological Flows and Water Levels</u>, which is intended to promote consistency in the way decisions are made around the country.

A *Proposed National Policy Statement: Freshwater* (PNPSFW), prepared under the Resource Management Act 1991(RMA) by the MfE, was released for public consultation in September 2008. The change in Government since the PNPSFW may mean significant revisions and possibly another round of consultation. We wait with bated breath for the recommendations of the Board of Inquiry to be released and the Government to finalise the policy.

In 2004, as part of the Sustainable Water Programme of Action (2003-2008) (SWPoA), the MfE published the <u>Water Bodies</u> <u>of National Importance</u> (WoNI) report. This report identifies potential freshwater bodies that are of national importance for recreation.



Figure 1. The Christchurch City and Selywn District. Source, Mark Burgess.

The current government's '<u>New Start for Freshwater</u>' (NSFW) work programme includes the Land and Water Forum (LWF), announced at the Environmental Defence Society (EDS) Conference in June 2009. This Forum has been developed from the Sustainable Land Use Forum (SLUF), established in 2008, with expanded membership, now including iwi representatives, industry representatives and members of the Turnbull Group (a forum convened by Water New Zealand). The LWF aims to report back to government by July 2010 recommending goals and long term strategies for freshwater management.

The <u>National Water Conservation Order (Lake Ellesmere)</u> <u>1990</u> (WCO) recognises the outstanding wildlife habitat of Te

Waihora/Lake Ellesmere and affects its management, allowing for the application of resource consents for the opening and closing of the lake within certain times and lake levels and preventing further damming, stopbanking or drainage below a certain level. The existing resource consents expire in 2011. Another WCO, the <u>National Water Conservation Order (Rakaia</u> <u>River) 1988</u>, recognises the Rakaia for its outstanding natural character as a braided river and its value for wildlife, fisheries and recreation.

Local government and Ngai Tahu instruments and activities

Operating under the RMA, the Regional Policy Statement (RPS), Transitional Regional Plan (TRP), Selwyn District Plan, Christchurch City Plan, and Banks Peninsula District Plan each have sections or chapters relevant to water issues and their management. The Long Term Council Community Plans (LTCCP), prepared under the Local Government Act 2002 (LGA) and associated annual plans, asset management plans and rating schemes (targeted and general) drive and fund much of the water management activity by local government bodies. A Ngai Tahu/DoC Joint Management Plan (JMP) for Te Waihora/Lake Ellesmere (prepared under the Conservation Act 1987), and the non-statutory Te Runanga o Ngai Tahu Freshwater Policy (1999), also have weight in statutory decision-making processes. The Treaty of Waitangi (Ngai Tahu Claims Settlement Act 1998) needs to be considered when looking at water issues. It is not explored further here other than to note that Ngai Tahu claims to water have yet to be addressed and there are ongoing behind-the-scenes negotiations, with considerable interest in the Waikato River co-management arrangements apparent. In the absence of resolution of these claims, Ngai Tahu continues to have to argue, more than one would expect, for its planning documents to be considered in planning and management of water resources.

Programmes, processes and actors

The following briefly outlines the more directly influential programmes, activities, and processes directly affecting water that are underway in the area.

The <u>Canterbury Regional Policy Statement</u> (CRPS) provides an overview of the resource management issues of Canterbury: chapter 9, Water, addresses competing demands, and land use effects on water flows and levels and discharge of contaminants; chapter 10 covers Beds of Rivers and Lakes and their Margins. It became operative in 1998 and is currently under review. A revised chapter 10 has been approved for consultation and will be restricted to the beds of lakes and rivers, with issues concerning water margins to be covered by the new biodiversity chapter. The revised Chapter 9 has yet to be drafted but will no doubt be strongly aligned to the recently released Canterbury Water Management Strategy (CWMS).

The <u>Proposed Natural Resources Regional Plan</u> (PNRRP) prepared by ECan under the RMA is a laudable attempt to have one fully integrated regional plan for the natural resources of Canterbury. As such, it probably presents an argument against such holistic, integrated approaches as it has been very hard to work through the plan processes. Activities cannot have effects that contravene a rule in the regional plan and consequently its rules constraining water use and activities that affect water have been fought hard by those whose (potential) activities might be affected by the plan. The length of time taken for the PNRRP to move through the process is part of the reason that Canterbury has been criticised for not having a regional water plan – and the resulting race for water rights. Key chapters on water are: 4. Water Quality; 5. Water Quantity; 6. Beds and Margins of Lakes and Rivers; and 7. Wetlands.

Chapter 5 of the PNRRP includes standards for defining the oft-mentioned proposed "red" zones: those areas where ECan considers groundwater has been fully-allocated (i.e. permission has been granted to take more groundwater than the estimated allocation limit; most would consider this over-allocated and unsustainable). Smaller catchment statutory plans are also under preparation.

The Canterbury Water Management Strategy (CWMS) is a work in progress by the Canterbury Mayoral Forum (which includes the Mayors, the Chair of ECan and Chief Executives of each council in the Canterbury region). It commenced as a means to identify suitable sites for new infrastructure (dams, water races, etc.) to capture and relocate water to farming activities in the region. As work progressed, the need to take a broader, integrated approach was recognised and by the end of 2009, after significant public consultation, the strategy was finalised. It is effectively a structure plan on a grand scale, also providing a strategic environmental assessment of options for creating "new" water and ensuring its sustainable use. As a non-statutory strategy it will need to be implemented through regional and district plans and LTCCPs, or through new legislation which could potentially duplicate the existing RMA and LGA provisions. To be fully implemented it is likely to be dependent on gaining central government funding for the significant front-end restoration and environmental objectives. It proposes new layers of collaborative governance comprising Zone Water Management Committees (ZWMCs; these zones are not integrated catchments due to overlapping groundwater and relocated waters), a Regional Water Management Committee (RWMC; for inter-zonal issues), and a National Tripartite Forum (for issues beyond the regional, such as Waitangi Treaty water claims). A semi-autonomous Water Executive based in ECan will manage implementation of the CWMS. A public/ private partnership Water Infrastructure and Services Entity is being investigated with a view to it having large infrastructure design, building, financing and operating responsibilities. The details of these arrangements are still to be resolved, but at present there are four ZWMCs in the SDC and CCC area, only one of which (Banks Peninsula ZWMC), is entirely within just one of these councils.

In 2003 the CCC and SDC established the <u>Central Plains Water</u> <u>Trust</u> (CPW) to facilitate sustainable development of Canterbury's water resources. Central Plains Water Ltd (CPWL) was subsequently formed, with around 400 shareholders, to raise funds and obtain consents for a water supply scheme. In April 2009 commissioners signalled that they would probably reject the initial proposal which included a 55m dam in the Waianiwaniwa Valley. The scheme was revised and resubmitted and

has received interim approval to take water from the Waimakariri and Rakaia Rivers for irrigation, with a final decision to be made in 2010. "Central Plains Water" is a phrase that may be used to describe the project or either of the organisations, and the scale of the project provided an intense focus to water issues in Canterbury.

The <u>Christchurch City Surface Water Strategy</u> (CCSWS) was released and consulted on by Christchurch City Council and adopted in late 2009. It updates CCC's 1999 Natural Asset Management Strategy, but marks a significant shift away from that strategy's narrow focus on drainage to a more holistic vision. The CCSWS is primarily focused on integrating water asset management to achieve improved water quality, ecosystem health, recreation amenity, and reduced flooding hazards in Christchurch City, which now includes the former Banks Peninsula district. It uses Integrated Catchment Management Plans (ICMPs) as its primary coordination method in response to the CRPS; but, despite the use of "catchment" in the name, these are really just areas that are treated similarly. One ICMP, for instance, covers the headwaters of the Heathcote and Halswell Rivers, but not their lower reaches, and these rivers are not connected to each other. The CCSWS also emphasise supporting the role of community organisations in water management issues.

The *Five Waters Management Strategy* (FWMS) was prepared and finalised by the SDC in 2009. It is essentially an asset management plan that seeks to improve water quality and reduce water inundation risks. The five waters are: water supplies (urban and rural); wastewater schemes; water races; land drainage; and stormwater.

The Waihora Ellesmere Trust (WET) aims to restore the ecosystems and biodiversity of Te Waihora/Lake Ellesmere, to educate people about the lake, and to promote better management practices through partnerships with landowners, community groups and statutory agencies. WET has organised two Living Lake Symposiums (I and II) held at Lincoln University in 2007 and 2009¹. These bring together the latest information on the 20-25,000ha Lake Ellesmere/Te Waihora and its catchment, providing excellent information and a forum for cross-disciplinary and interagency/community dialogue.

One of the outcomes of the first Living Lake Symposium was the establishment of the Statutory Agencies Group (SAG), comprising Ngai Tahu, ECan, CCC, SDC, F&GNZ, (North Canterbury Region), MFish, DoC and WET(who also facilitate the group). SAG was formed in 2008 as a means to achieve greater integration of programmes and actions to improve the management and health of Lake Ellesmere.

Waihora Ellesmere Catchment Riparian Restoration Pro-

gramme (WECRRP) is a WET programme with funding primarily from MAF's Sustainable Farming Fund (SFF) and the MfE's Sustainable Management Fund (SMF). It is also significantly supplemented by ECan and SDC funding and in-kind assistance, and various other partnerships where practicable. The programme involves riparian restoration, but includes a significant monitoring programme in partnership with LEaP to assess the effectiveness of its programme.

Living Streams is an ECan approach to building partnerships with "the community" to improve water quality and the health of waterways. It is run by the Resource Care team at ECan, who provide advice and assist individual landowners and community groups to collate local and scientific knowledge, obtain funding, and take actions to restore degraded streams. It has produced excellent handbooks and environmental education materials and works closely with the other councils.

The <u>Avon-Heathcote Estuary Ihutai Trust</u> was formed in 2002 by community members and is supported by CCC and ECan. Their objectives include the preservation of the natural and historic resources of the estuary; they seek to involve individuals, community groups and statutory agencies in a number of different programmes, such as advocacy, management, monitoring and education.

The Lyttelton Harbour Issues Group (LHIG) and the <u>Akaroa</u> <u>Harbour Issues Working Party</u> (AHIWP) are community volunteer groups facilitated by ECan's Resource Care team. Both groups celebrated their tenth anniversary in December 2009. One of the main issues they are concerned with is the improvement of water quality in the harbours which requires improved catchment management, including better erosion and sediment control during subdivision developments. Both groups provide volunteers to carry out community water monitoring in the summer months as part of the Safe Water Information Monitoring programmes known as SWIM (in Lyttelton Harbour) and SWIMA (in Akaroa Harbour; the A stands for Akaroa). The volunteers collect water samples that are analysed by ECan and provide data on water quality in many popular swimming spots in the Harbours.

A number of community trusts, such as the <u>Travis Wetland</u> <u>Trust</u> and the <u>Styx Living Laboratory Trust</u>, are also active in the Christchurch area.

Waterwatch (Kaitiaki Wai), a programme of the Isaac Centre for Nature Conservation based at Lincoln University, involves schools and community groups in scientific monitoring of streams and rivers as part of environmental education. It has collected an extensive water quality database of streams at places often not covered by other monitoring programmes. ECan and DoC also work with school groups in Canterbury, increasing understanding, and helping with local monitoring and restoration programmes.

<u>State of the Takiwa</u> (SoT) is a Ngai Tahu programme for monitoring and reporting on the cultural health of natural resources, including water resources, as part of the Ki Uta Ki Tai, Mountains to the Sea, Natural Resources Management Framework. In 2007 the report <u>State of the Takiwa: Te Ahuatanga o Te Ihutai</u> (Cultural Health Assessment of the Avon-Heathcote Estuary and its Catchment) was produced for ECan as part of a wider research project.

The Protocol for Opening and Closing Lake Ellesmere/Te Waihora (2005) is managed by ECan in consultation with a number of organisations, or parties to the protocol: Lake Settlers Asso-

¹ See article on page 49 of this issue (Ed.)

ciation, TRoNT, Te Taumutu Runanga, WET, F&GNZ (North Canterbury Region), DoC, Lake Ellesmere Commercial Fishermen's Association, SDC, and Banks Peninsula District Council (now CCC). To meet a condition on the resource consent for the mechanical opening of Lake Ellesmere, ECan convenes regular meetings of these stakeholder organisations and consults with all parties when a specific opening is proposed. Any of the parties can request that a meeting be called with regard to a proposed opening of the Lake, but the final decision on opening the Lake remains with ECan.

<u>Selwyn Water Allocation Liaison Group</u> (SWALG) is a group of stakeholders comprising primarily those farmers extracting water from the Selwyn aquifers and was formed and facilitated by LVL as part of a Foundation for Research, Science and Technology (FRST) funded research programme. It primarily involved a series of meetings where scientists updated and exchanged information with farmers who are water extractors.

In 2008 the <u>Rakaia Selwyn Cluster Groups</u> were established by ECan in five separate areas, based on similarities in water issues. They are groups of consent holders whose consent conditions are under review. The intention was to enhance communication between the consent holders and ECan. The aims of the review, which is still underway in early 2010, is to reduce the effects of water abstraction in the Rakaia-Selwyn zone on lowland streams and improve security of supply for consent holders.

There are also five drainage rating districts administered by ECan which are at least partly in Selwyn District and four within Christchurch City (ECan have no involvement in the Avon or Heathcote Rivers in Christchurch or LII in Selwyn) where landowners pay targeted rates to partially fund river control and drainage objectives that are agreed between ECan (<u>River</u> <u>Engineering Group</u>) and representatives of each rating district. The details of such work programmes are usually set out in asset management plans available on request from ECan and prepared under the LGA. The River Engineering Group also addresses regional gravel management issues and river control works for utility operators. Its professional staff is engineers.

Comment

A review of the above programmes shows several significant features. First, there has been a lack of national direction. This reflects the ongoing tensions between central and local government and the move in the neo-liberal 1980s to set up systems where "big" government did not interfere with the market or with local communities and consequently sought to shift decision-making, accountability and costs to the individual and communities. The emerging attempts to introduce national mechanisms to direct and override local decision-making commenced with the 1999 Labour Government and is being continued and strengthened by the National-led Government. So there is a consensus at national level that local government and neo-liberal approaches have failed in relation to water management, even if this is not something New Zealand governments would publicly admit. Local government is accepting of this new interference/direction to some degree as it finds the costs (especially legal and environmental) of achieving sustainable

use of water resources are too great without central government support, either legislative or financial.

Second, Ngai Tahu's integral connection with the water resources will be played out over the coming years in the form of co-management agreements which may not integrate well with strategies and approaches that have not been driven by an understanding of Te Ao Marama (natural world).

Third, there is a locally-led evolution away from single statute "silo" approaches, to finding mechanisms that integrate across narrowly-defined statutory roles and responsibilities. Local community organisations, facilitated especially by ECan, are playing significant roles in this, but there are also significant intra-governmental efforts despite public political posturing.

Fourth, there is a move towards integrated water or integrated catchment management. The two are not the same. Local government's major involvement is driven by requirements to provide water, drainage and sewage infrastructure (under the LGA) and they may develop integrated water management infrastructure (asset) plans that are inconsistent with integrated catchment management (e.g., the CWMS and CCSWS). These approaches pragmatically eschew natural catchments because of the flat, highly modified topography, overlapping and modified water systems and the capacity to mechanically shift water between catchments and uphill.

Fifth, local community groups have tended to form around identifiable aquatic bioregional water bodies (a lake, harbour or estuary) that gives them their identity. They then evolve towards catchment management approaches as they gain greater knowledge and understanding and recognise the importance of land use impacts on the water bodies of original concern.

Conclusion

Thus we have a move towards catchment management, driven by local communities, that is concurrent with, but may be contrary to, council moves to build or integrate water infrastructure management. The unifying interest is (implicit) understanding of the failure of a laissez-faire approach to water and land use and recognition of the need to integrate wider land use management and planning with water resource planning and management. Co-management (collaborative governance) approaches, particularly with Ngai Tahu, are emerging to dominate the arena. For planners then, achieving sustainable use of Canterbury's water resources requires integrating the expertise of environmental planners and managers with that of traditional town planning and infrastructure design.

* Adrienne Lomax is in her final year of the Master of Environmental Policy degree at Lincoln University.

* Hamish Rennie is a Senior Lecturer in the Department of Environmental Management, Lincoln University, and a trustee and past chair of Waihora Ellesmere Trust.