

INQUIRY INTO WATER AUGMENTATION

Organisation: Local Government NSW

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Draft Submission

NSW Legislative Council General Purpose Standing Committee No. 5 Inquiry into the Augmentation of Water Supply for Rural and Regional New South Wales

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Opening

Local Government NSW (LGNSW) is the peak body for councils in NSW, representing NSW general-purpose councils, associate members including special-purpose county councils, and the NSW Aboriginal Land Council. LGNSW is the organisation for all things local government in NSW. LGNSW facilitates the development of an effective community based system of local government in the state.

LGNSW thanks the NSW Legislative Council General Purpose Standing Committee No. 5 for the opportunity to make a submission to its Inquiry into the Augmentation of Water Supply for Rural and Regional New South Wales.

Comments

Local government plays an important role in water management and in the provision of water services to the community. In regional NSW, councils also provide urban water services; i.e. water supply and sewerage services. There are over 90 council owned and operated local water utilities providing these services to around 1.8 million people. They generate over \$1.2 billion in annual revenue and hold total water supply and sewerage assets valued at around \$26 billion.¹ This is a significant responsibility and involves ensuring supply security through infrastructure provision, demand management and integrated water cycle management.

LGNSW, in consultation with its members, has developed a number of core positions with respect to how water resources in NSW should be managed including:

- **Consider all supply and demand management options**
To achieve secure, reliable and safe water services at efficient cost, it is essential that policy settings ensure that costs, benefits and risks of all supply and demand side options are considered adequately and on an equal footing.
- **Guarantee security and quality of urban water supplies in regional NSW**
To ensure communities in regional and rural areas receive safe and secure water supply and sewerage services, it is critical that water resource management in NSW guarantees the security, and protects the quality of, urban water supplies managed by council local water utilities.
- **Address regional socio-economic impacts of water resource management**
To ensure communities in regional and rural areas can maintain quality living standards, social wellbeing and economic development opportunities, it is critical that socio-economic impacts on regional economies of environmental water management, especially reductions in water availability for productive use as a result of this, are fully identified and structural adjustment assistance is provided where required.

In the context of these core positions, LGNSW provides the following comments to the Inquiry with respect to the relevant terms of reference.

¹ NSW Auditor-General, Country Towns Water Supply and Sewerage Program - Performance Audit, (2015), page 2.

a) Requirement for a water equation (demand and supply out to the middle of this century) for rural and regional New South Wales.

b) The suitability of existing New South Wales water storages and any future schemes for augmentation of water supply for New South Wales, including the potential for aquifer recharge.

LGNSW supports the examination of the suitability of existing NSW water storages and any future schemes for augmentation of water supply for NSW for all water users including agriculture, other industries and urban water supplies.

However, analysis should not only focus on supply augmentation but equally consider demand side options. To achieve secure, reliable and safe water services at efficient cost, it is essential that costs, benefits and risks of all supply and demand side options are thoroughly considered.

LGNSW also emphasises the importance of examining the suitability, with respect to both quantity and quality, of alternative and climate independent water sources for the augmentation of water supplies.

The natural, social and economic systems of rural and regional NSW will all be affected by climate change and reductions of water availability as a result of it. According to modelling of rainfall response to global warming in NSW undertaken for the NSW Database of Future Climate Projections, the median or best estimate indicates that future mean annual runoff in the region in about 2030 relative to 1990 will be lower by 0% to 20% in the southern parts of NSW, not change or slightly reduce in the eastern parts of NSW, and be higher by 0% to 20% in the northwest corner of the state. Averaged across the entire region, the median or best estimate is a 5% decrease in mean annual runoff.²

Potential alternative and climate independent water sources include:

- Harvesting and recycling urban stormwater;
- Managed aquifer recharge;
- Indirect or direct potable reuse;
- Further utilisation of ground water resources; and
- Desalination.

The analysis of water supply in NSW also needs to specifically focus on the security of urban water supplies that are required to provide potable water to communities in regional NSW.

Council owned local water utilities have been successful in delivering water supply and sewerage services in a safe, secure, efficient, and affordable manner under the Department of Primary Industries - Water's (DPI Water's) Best Practice Management of Water Supply and Sewerage Framework and should remain in council hands. DPI Water monitors and reports on performance of local water utilities in its annual *NSW Water Supply and Sewerage Performance Monitoring Report*. These reports demonstrate the solid achievements in quality, productivity and water security that have been made by local water utilities including:

- Local water utilities undertaking robust and comprehensive integrated water cycle management including long-term water supply and demand planning.

Local water utilities have the necessary local/regional knowledge of relevant factors with respect to supply and demand and the ability to identify community priorities and willingness to pay. They plan future supply and demand considering all supply side options (including

² NSW Government, Future climate and runoff projections (~2030) for New South Wales and Australian Capital Territory, (2008).

stormwater harvesting, sewage effluent reuse, irrigation scheme tailwater, new groundwater bores, pipeline connection to other nearby systems, and projections of associated future water availability) and demand side options (including projections of future demand, water restrictions, other demand measures).

- Local water utilities provide services efficiently and with affordable prices –typical residential bills and operating cost are similar to the national median and comparable water utilities; average household and business water consumption continues to fall.

Local water utilities operate under a modern long term strategic business planning and pricing framework including full cost recovery, pay-for-use water pricing and developer charges. The pricing framework fully complies with the requirements of the *National Water Initiative* including the *National Water Initiative Pricing Principles (2010)*. Local water utilities operate as separate business units and expenditure and income streams are ring-fenced from those of other council activities.

Most local water utilities have been achieving positive economic real rates of return and full cost recovery for many years (e.g. in 2014/15, all LWUs achieved full cost recovery for water supply and 98% for sewerage).

In 2014/15, operation, maintenance and administration cost per property for water supply was lower than the national median and compared to utilities in country Victoria. The real typical residential bill for water supply and sewerage has increased by only 20% over the last 20 years and is lower than the national median.

The median water usage charge of 226c/kL is relatively high and provides a strong pricing signal to encourage efficient water use. In 2014/15, average annual residential water supplied was 166kL/connected property and has reduced by 50% over the past 24 years. The trend in reductions is due mainly to consumption based pricing, together with implementation of water conservation and demand management measures by local water utilities, including drought water restrictions. The figure of average annual water supplied was similar to country Victoria and lower than the national median.

- Local water utilities provide safe drinking water - for the last few years all local water utilities met the microbiological targets of the *Australian Drinking Water Guidelines (2011)* (ADWG) and all local water utilities have now prepared and are implementing drinking water quality management systems in accordance with the risk based framework required under the *Public Health Act (NSW) 2010* and the ADWG.

In 2012/13, 2013/14 and 2014/15, the drinking water supply for 99.9% of the urban population in regional NSW complied with the ADWG for both microbiological and chemical water quality. In 2013/14 and 2014/15, all local water utilities complied with the microbiological targets of the ADWG (benchmark of 98% of samples to be E.Coli free); with 99.8% of 20,200 samples tested in 2013/14 and 99.9% of the 19,400 samples tested in 2014/15 complying).

- Local water utilities have the skills and capacity to deliver services - every local water utility responsible for providing water treatment has at least one fully qualified water treatment operator to operate the 163 water treatment works and 73 chlorinators and aerators. In addition, 419 operators are fully qualified wastewater treatment operators and are employed in operating sewage treatment works.
- Local water utilities also proactively seek efficiency savings by capturing economies of scale, improve regional planning and enhance the efficiency and effectiveness of service provision. They have formed regional water alliances, such as the Centroc Water Utilities Alliance or the

Lower Macquarie Water Utilities Alliance, to share resource and coordinate regional water supply and demand planning, asset management and workforce development.

It is critical for water resource management policies and practices to ensure the long term security of urban water supply for all water availability scenarios.³

This requires close consultation with council local water utilities to take account of:

- Water needs identified by local water utilities in their urban water supply and demand analysis and integrated water cycle management plans;
- Actual and anticipated growth patterns (population and industrial development) experienced and planned for in communities in regional NSW; and
- Potential impact of climate change on water availability and water quality.

Climate change in particular, is likely to have significant impacts on the security of urban water supplies.

A pilot study to determine the potential impact of variable climatic patterns on 11 local water utility water supply systems in regional NSW was undertaken by DPI Water during 2009 to 2011. It found that variable climatic patterns do pose a potential threat to local water utilities' security of supply and that future secure yield of supply systems is reduced by up to 9% for coastal utilities and by approximately 30% for inland water utilities in mid and southern NSW.⁴

Furthermore, the effects of climate change, such as increased occurrence of extreme weather events, higher temperatures, or sea level rise, will put pressure on local infrastructure, reducing the life of assets, increasing the of whole-of-lifecycle cost, or requiring new infrastructure solutions.

More work is required to assess the impacts of climate change on water supply yields and water supply infrastructure and identify solutions to address those impacts.

LGNSW continues to call on the NSW Government to provide assistance and funding for councils' local water utilities to identify and address climate change related infrastructure needs. LGNSW has welcomed the NSW Government's Water Security for Regions program which provides funding for infrastructure projects in regional areas that enhance water security including storage/dam augmentation, pipeline and bore works, and water efficiency mechanisms.

f) Social, economic and environmental aspects of water management practices in New South Wales and international jurisdictions, including the following case studies:

- i. Broken Hill town water supply/Menindee Lakes system;*
- ii. South Western NSW water management practices;*
- iii. North Western NSW water management practices.*

g) The efficiency and sustainability of environmental water being managed by different State and Federal Government departments and agencies.

LGNSW urges the inquiry to examine how water resources management policies and practices with respect to recovering water for the environment (e.g. the implementation of the Murray-Darling Basin Plan) impact on the social and economic circumstances in communities in regional and rural NSW.

³ This is particularly relevant for utilities which do not have their own major storage facilities and are dependent on water allocation from regulated or unregulated rivers.

⁴ DPI Water, Assuring future urban water security - Assessment and adaption guidelines for NSW local water utilities – Draft guidelines, (2013).

LGNSW recognises the need for, and supports the implementation of, sustainable levels of water diversions to protect the environmental health, resilience, and productive base of river systems in NSW and beyond. However, LGNSW is very concerned about the impacts this might have on the social and economic fabric of regional communities.

Water recovery for the environment and the associated reductions in water availability for agriculture and other water dependent, productive industries are likely to have significant socio-economic impacts on affected regional economies, communities and councils.

LGNSW believes it is critical that the process of identifying and addressing socio-economic impacts is strengthened. Importantly, socio-economic impact analysis needs to include full cost analysis of localised impacts, identification of options for affected communities to make the transition to a future with less water and provision of structural adjustment assistance where required. Adjustment assistance needs to address wider economic and social impacts on communities (e.g. impacts on related industries and associated employment; impacts on public services such as schools, medical services, and local government services; impacts on young people and their opportunities in regional areas and impacts on Aboriginal people).

Identifying and addressing these impacts is particularly important in more vulnerable regions that are highly dependent on (irrigated) agriculture and subject to significant water recovery and where underlying social and economic conditions are quite challenging, such as in and around Warren, Collarenebri or Deniliquin-Wakool.

The inquiry should also examine how enhanced focus could be given to acquiring water for the environment by way of investment in water use efficiency and water saving infrastructure.

Such investment, as distinct from uncoordinated water entitlement purchases from willing sellers, would ensure that government spending remains in the regions and supports their productive capacity, is available for economic adjustment and helps affected communities with the transition to a future with less water.

Water recovery through infrastructure investment, which essentially recovers water by reducing losses, can lead to direct benefits to the farmers and to their respective communities. Those benefits may include increased activity for non-farm businesses associated with installing the new infrastructure.⁵

LGNSW is also concerned about how environmental water management affects urban water supplies and local water utilities' ability to plan and provide for the potable water needs of their communities.

To ensure communities in regional and rural areas receive safe and secure water supply and sewerage services, it is critical that environmental water management does not undermine the security and quality of urban water supplies managed by councils' local water utilities.

<i>i) Other related matters.</i>

LGNSW requests that the inquiry consider, and make recommendations on, how the NSW Government and local water utilities can contribute to achieving the United Nations Sustainable Development Goal No. 6: *Ensure access to water and sanitation for all*.

Particular focus should be given to the following targets of the goal:

⁵ Murray-Darling Basin Authority, Submission to the Select Committee on the Murray-Darling Basin Plan, (2015), page 45.

- Improve water quality by reducing pollution, eliminating dumping and minimising release of hazardous chemicals and materials, and substantially increasing recycling and safe reuse;
- Substantially increase water-use efficiency across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity and substantially reduce the number of people suffering from water scarcity;
- Implement integrated water resources management at all levels, including through trans-boundary cooperation as appropriate;
- Protect and restore water-related ecosystems, including mountains, forests, wetlands, rivers, aquifers and lakes; and
- Support and strengthen the participation of local communities in improving water management.

LGNSW hopes that its comments are of assistance and looks forward to continuing to contribute to achieving secure, reliable and safe water services in NSW.

For further information on LGNSW's submission, please contact, Sascha Moege, Senior Policy Officer on