

RESPONSE FROM THE CITY OF JOONDALUP ON THE DISCUSSION PAPER  
- INQUIRY INTO A SUSTAINABILITY CHARTER

**General statement**

While the City of Joondalup responds to the terms of reference of this inquiry it is considered that the issue of a sustainability charter is far broader than the scope of the questions contained in the discussion document. At the Australian Government level, sustainability concepts and policy should include reference to social, cultural and economic principles as well as environmental ones to enable a fully integrated response to a very complex and interlocking system.

**Q1. Should a sustainability charter consist of aspirational statements, set targets (such as measurable water quality) or both?**

Both aspirational statements and lists of issues that require targets should be part of the Sustainability . Aspirational statements alone will not provide a mechanism to measure if Australia is moving towards a more sustainable future. Targets should be set for many objectives such as CO2 emissions and water quality. However the list of targets and the level of the targets should be revised and added to after periodic reviews. Targets need to include qualitative measures, not only quantitative ones.

**Q2. What research will be needed to develop and support the Sustainability Charter?**

Research should be ongoing as we develop a better understanding of the interactions of our complex planet and human societies. Many of the barriers to sustainability are cultural as much as technical. Many technical barriers can be dealt with in a standard Newtonian scientific manner. However the interaction of societies' cultural values and beliefs and changes in understanding of the science of the planet cause more chaotic social systems changes. The unpredictable social systems changes will require equal research to that of the efforts put into standard scientific research of the physical realities of sustainability.

Research needs to deepen our understanding of existing ecological and social systems but also needs to be innovative and exploratory, especially in regards to interactions between systems and overall interconnectivity.

**Q3. Can existing standards (such as the Water Efficiency Labeling and Standards (WELS) Scheme) be applied to the Sustainability Charter?**

Existing standards should be a minimum. They are part of the complex process to move towards sustainability. The question of what category of matters is identified, as requiring standards should be part of the Sustainability Charter. The actual level of the Standards should be a separate and ongoing process as the steps towards sustainability are measured.

**Q4. What are they?**

Standards should be based on recognised scientific research and at a minimum include international standards of OECD, European Union and the like.

**Q5. Can the charter be framed in such a way to ensure that it can be integrated into all levels of government decision-making?**

Integrating the charter into all levels of government decision-making should be a priority. The instructions to who ever drafts the charter should include the instruction that the charter is intended for all levels of government. It is highly desirable that this occurs in order to co-ordinate decision making in a strategic way, increase coherency and reduce duplications. Furthermore, Government decision-making and policy should be integrated into the sustainability charter in order that the charter becomes the overarching framework as opposed to integrating the charter with government decision –making.

**Q6. Will there be a cost/gain to the economy by introducing the target(s)?**

The question of costs and gains to the economy is in part determined by how the accounting is done, and the time period considered. If conventional economic theory is used then it would be probable that introducing a sustainability charter could be seen as creating costs. If the answer to this question is sought through ecological economic theories and taking a long-term view then it is expected that the economy would gain.

By way of example, the introduction of the 'Water Tank' program will have an initial cost, however based on supply and demand, the cost should come down during the 'pay-back' period. The pay-back period for the 'consumer' (retail) in relationship to the 'wholesaler' (Water companies and government) is different because of the margins, however, the long-term gains are both financial and achieve increased sustainability.

**Q7. Could a sustainability charter be incorporated into national State of the Environment reporting?**

Yes, however State of Environment reporting falls short on social, cultural and economic reporting.

The environment report is one of the mechanisms for measuring the success of the sustainability charter with respect to the environment; however there should be a drive to create state of society reporting equivalent to the state of the environment report and state of the economy reports.

**Q8. Is National Competition Policy a good template for consideration of incentive payments for sustainable outcomes?**

Yes, improved sustainability performance should be rewarded. Some of the actions required to move towards sustainability do not have immediate financial rewards, therefore other incentives may be required.

Incentive payments could be considered through the taxation system to both business and individual households.

**Q9. How should payments be awarded under the Sustainability Charter?**

Currently the Grants Commission allocates federal money to local governments. This is achieved based on some complex formulas. Payments under the sustainability charter from the federal government to local governments could be delivered through the Grants Commission, but the mechanism for equitable payment system would need to be reviewed in consultation with local government.

Furthermore, payments could be delivered in accordance with level of achievement against targets. Payments or tax concessions to complying companies, organizations and governments who have made significant contributions could be made directly and special payments should be made to encourage collaborative partnerships contributing to sustainability.

**Q10. Is it possible to measure cultural and social values in relation to a Sustainability Charter?**

Yes and it should be part of the process of moving Australia towards a more socially and culturally sustainable future.

### **Q11. What objectives are applicable to the built environment?**

Those adopted by Sweden as outlined on page 17 of the discussion paper would be appropriate.

Cities, towns and other built-up areas must provide a good, healthy living environment and contribute to a good regional and global environment. Natural and cultural assets must be protected and developed. Buildings and amenities must be located and designed in accordance with sound environmental, social and cultural principles and in such a way as to promote sustainable management of land, water and other resources.

### **Q12. How would these be measured?**

Generally the Australian Government should be using current and developing international and national measures of social, economic and environmental wellbeing.

Specifically they may include:

- Amount and health of biodiversity and bush land retained
- Human health and wellbeing indicators
- Environmental indicators such as air and water quality
- Number of passive solar houses and sustainable buildings
- Green star rating for buildings
- Ask people
- Number of native gardens
- Change in ecological footprint of cities
- Amount of waste
- Type of waste
- Recycling schemes.

Such resources are available through organisations such as Redefining Progress, (see <http://www.rprogress.org>)

Finally, no matter what measures are applied they must be placed into an ongoing monitoring, review and improvement cycle.

### **Q13. How should we rate the sustainability of existing building infrastructure?**

The rating should have its basis founded in a “whole of life costing” approach, that takes into account all aspects of infrastructure including:

- Insulation levels
- Passive solar potential
- Actual energy and water efficiency measures implemented
- Building materials used
- Ceiling height
- Heating appliances
- Floor plan to inhabitant ratio
- Block size to inhabitant ratio, and
- Footprint.

### **Q14. Could a measurement of level of retro-fitting achieve this?**

This could be part of it but would not achieve all.

### **Q15. How would we measure levels of retro –fitting?**

A certain level of measurement of retro fitting would need to occur at the point of delivery through Local Government and State Government application processes of building approvals.

At an individual householder level comparing original water and energy level use with improved levels can be used for retro fitting initiatives. A number of examples currently exist where this has occurred.

The Western Australian Government was offering rebates for householders wishing to convert from wood fired heating to gas.

The National Cities for Climate Protection (CCP) program coordinated by ICLEI in partnership with the Australian Greenhouse Office (AGO) requires Local Governments, on a voluntary basis, to reduce greenhouse gas emissions through organisational and community incentive and education programs.

The City of Joondalup has undertaken three pilot programs through funding received from the Australian Greenhouse Office. The programs provided for energy consultants to go into private homes, schools and small business to assess their energy use and give advice on reduction management plans, which often includes retro fitting.

Furthermore, ICLEI has recently initiated the ‘Water Campaign’, which is another incentive reduction program for water. Program such as these should be more strongly supported and funded as they have significant impact on reducing energy and water usage whilst providing sustainable building outcomes through retro fitting.

**Q16. Do we need to protect heritage buildings as part of the sustainability charter?**

Yes, they are part of our social values. They should be retro fitted where appropriate and if suitable.

**Q17. Can existing building standards, such as the 5 star rating system, be incorporated into the Sustainability Charter?**

Possibly, however, they would need to be evaluated in terms of what they can achieve.

**Q18. How should water quality be measured?**

The City would support the Swedish example outlined in the discussion paper page 17 and furthermore the WA Government initiatives towards water quality management are also sound and should be considered.

Sweden

Groundwater must provide a safe and sustainable supply of drinking water and contribute to viable habitats for flora and fauna in lakes and water courses. This will be measured by:

- the level of fluorides and nitrates in water
- the protection of water-bearing geological formations
- protection of groundwater levels
- provision of good quality drinking water as measured by the Swedish standards for good-quality drinking water with respect to anthropogenic pollution.

Western Australia

- Ensure that land uses do not contaminate drinking water catchments.
- Improve understanding of aquatic systems and link this to the management of all aquatic systems.
- Protect all drinking water catchments and all aquatic systems of high environmental/conservation, scenic and heritage significance.
- Manage aquatic systems to agreed conditions for a range of environmental values through a catchment management context.
- Incorporate social and cultural values when managing aquatic systems.
- Increase community awareness and involvement in the management and protection of drinking water catchments and all aquatic systems.
- Ensure that abstraction of water does not exceed the water requirements of aquatic ecosystems.
- Provide for the protection of water-dependent ecosystems, while allowing for the management and development of water resources to meet the needs of current and future users.
- Ensure stormwater is recognised as a valuable component of the total water cycle and management objectives incorporate the sustainability of the receiving environment.

As part of their action plan the WA Government will be developing benchmark environmental quality criteria for aquatic systems to assist in the long-term assessment of progress towards meeting the objectives.

- Reduce water consumption.
- Extend responsibility for water supply to the planning system (water sensitive design) and to local government (Regional Councils) for groundwater supplies.
- Achieve significant wastewater re-use.
- Investigate long-term innovative water supply options that have broad sustainability outcomes

Part of the action plan for the State Water Strategy will be to provide for Perth's long term water supply needs through a sustainability assessment of the next major water supply source.

Apply drinking water quality standards for drinking water sources (above or below ground), however water quality in wetlands, rivers and other water features need to be measured according to individual requirements. Generally contaminants (such as heavy metals), nutrients and pH would be needed.

**Q19. Should targets be focused on reducing water consumption, increasing water re-use or both?**

Both to reduce demand and maintain supply.

A push towards better use of domestic water wastage, via recycling, rainwater from tanks for toilet and laundry use may produce up to 40% savings of drinking water supplies. A detailed and thorough marketing program promoting both financial and ecological savings would be required.

The recycling of household rainwater will assist in the sustainability of our water supplies. There are currently different rebates in each state from local councils for the installation of water tanks, this should be coordinated nationally and if possible included in to the building standard codes for new homes.

As outlined above water re-use is important, reducing water consumption needs to be re-marketed on a domestic level. All new homes should be required under law to use a minimum level of water saving technology.

**Q20. How can we measure the health of water catchment areas?**

First of all we need to understand the catchment in its entirety. That includes, but it not limited to, the water resources themselves, soils, vegetation, fauna, biodiversity, climate, people, settlements, land use and administrative boundaries.

The next steps is to decide what we mean by 'health' and try to find appropriate indicators that can work together to provide a picture of the whole catchment system (that is: the whole system as well as its parts and their interactions).

Furthermore, it is prudent to build on the existing Natural Resource Management (NRM) strategy, which is being addressed by the Federal Government through the delivery of accredited regional strategies within each State. For example the Swan NRM Strategy was developed in consultation with state government agencies, local government, industry, indigenous communities, catchment and community groups and the general community. The strategy was released in April 2005 and aims to promote the sustainable use and management of natural resources in the Swan Region of which the city of Joondalup is party. The flow on effect of NRM is down to local regions that look at an Integrated Catchment Management (ICM) approach for their local catchment areas.

The model for NRM is sound, however it is largely under funded and under supported in the initiation stages where ICM plans are required by local areas. Local Authorities are required to input resources in to the development of their plans before they can access any funding to support on ground initiatives. Councils that are not well resourced in their planning capability will likely not be able to develop their integrated planning approach and may not receive funding to address catchment issues.

**Q21. How should we measure the use of renewable energy?**

Energy providers should be able to measure levels of usage and supply of renewable energy. Examples could be:

- Number of households using it
- Megawatts produced and sold
- What the energy is used for (e.g. energy efficient appliances or power guzzlers).

**Q22. How do we encourage an increase in renewable energy use?**

- Increase production and reduce price.
- Education and awareness campaign.
- Incentives such as no interest loans to enable households to retrofit and install renewal energy infrastructure, which will be tied into energy bills.

**Q23. Can we measure the awareness of the environmental, economic and social benefits of energy efficiency and renewable energy?**

Yes additional questions should be incorporated into the existing census system undertaken by ABS every 5 years.

Sate Government and Local Government may also be encouraged to collect this type of response data from local communities, which can be centralized, back to a peak body.



**Q24. How do we judge the efficiency of transport systems?**

There are many ways that experts in this field could identify. Some examples may include:

- Energy use
- Land consumption
- Number of people transported
- Cost (apparent and hidden)
- Degree of coverage
- Ease of accessibility.

**Q25. What transport infrastructure measures will reduce private transport needs?**

- Higher frequency buses and trains
- Better bicycle facilities
- More user friendly systems
- Lower prices
- Better timing
- Needs oriented routing
- Higher degree of public safety.

Overall transport system to be designed so that the public transport system is faster, and therefore more attractive, than the use of private motor vehicles.

**Q 26. How do we measure these?**

- Number of customers
- People using bike facilities and other alternative transport\
- Ask users!

For further information please contact:

Rhonda Hardy  
Manager Strategic and Sustainable Development  
City of Joondalup  
PO Box 21  
JOONDALUP WA 6919

Ph: (08) 9400 4523

Fax: (08) 9400 4336

Mob: 0417 985 973

Email: rhonda.hardy@joondalup.wa.gov.au