

**SEARCH CRITERIA**

<b>Model</b>	Model C: Technological Development Model
<b>Industry</b>	Community, government
<b>Focus/Level</b>	Community
<b>Purpose</b>	Testing available knowledge
<b>Outcomes</b>	Development of a management practice
<b>Special Interest Groups</b>	Other
<b>Design and Implementation</b>	Designed by researchers/experts managed by farmers/Community

**1. PROJECT TITLE:**

Swan-Canning Clean up Programme

Reviewer Dr Fionnuala Frost

**2. FUNDERS:**

State Government of Western Australia (\$3.5 million per year for the overall programme. This is a 5 year programme. The State Government and Federal Government through programmes such as NHT, fund the sub-projects that comprise the overall Swan-Canning Clean-up programme.

**3. PROVIDERS:**

The Swan River Trust is the principle provider.

Key government agency providers are: Water and Rivers Commission; Department of Environmental Protection; Department of Agriculture, Western Australia; Department for Planning and Infrastructure and the East Metropolitan Regional Council.

Sub-projects managed under the Swan-Canning Clean Up programme initiative involve other government agencies, non-government agencies, corporate groups and volunteer/community-based programmes.

For example: *Swan Catchment Urban Landcare Programme* – In partnership with Alcoa World Alumina, the Cleanup programme supports the Swan Catchment Urban Landcare Programme (SCULP). This programme provides funds to community groups and government for a range of restoration and environmental protection projects.

*Ribbons of Blue*, a school environmental water quality monitoring programme is managed by the Water and Rivers Commission, the Education Department and Swan Catchment Centre. Ribbon's of Blue is an important sub-project of the Cleanup programme.

**4. KEY CONTACTS:**

Andrew Tomlinson, Programme Manager. [andrew.tomlinson@wrc.wa.gov.au](mailto:andrew.tomlinson@wrc.wa.gov.au)

Wendy Yorke, Community Relations Manager. [wendy.yorke@wrc.wa.gov.au](mailto:wendy.yorke@wrc.wa.gov.au)

**5. INDUSTRY/ISSUE/GEOGRAPHY**

The programme covers the Swan-Canning River in the Swan and Canning catchments respectively. This work extends from the Swan Valley and Ellen Brook sub-catchments in the north, Southern River sub-catchment in the south and extends

to Fremantle at the west coast. The Swan-Canning Catchment is 2000km<sup>2</sup> and includes in the entire metropolitan population of Perth, about 1 million people.

## 6. PROJECT CONTEXT

The Swan-Canning Cleanup programme recognises the importance of establishing an integrated catchment management programme, where the urban community has the opportunity to become involved with the management and health of the Swan and Canning Rivers. The project was launched by the State Government in June 1999 with the aim of tackling the increasing incidence of algal blooms in the rivers. The Perth community was becoming increasingly vocal in their dissatisfaction with the extensive and repetitive nature of the algal blooms that both exuded unfavourable odours and prevented recreational pursuits along the river. The Cleanup programme is guided by a four point plan. These points are:

1. Support Integrated Catchment Management to reduce nutrient inputs;
2. Improve planning and landuse management to reduce nutrient inputs;
3. Modify river conditions to reduce algal blooms; and
4. Monitor river health, fill critical gaps in knowledge and report progress to the community.

The action plan recognises the importance of an integrated approach to catchment planning. The Swan River Trust (SRT) also acknowledges that a task as complex and enormous as river health cannot be achieved by one single organisation and that it is essential that broad community involvement, from corporate to government, individuals and groups are involved.

## 7. PROJECT NICHE

The project aims to fund and support projects under each of the four point action plan. The Cleanup programme supports both the ongoing research on river health, the state of the river and river management, and at the same focuses its work through 13 priority catchment areas. These thirteen groups are: Ellen Brook; Bennett Brook; Bayswater Main Drain; Susannah Brook; Jane Brook; Blackadder Creek; Coastal Zone; Helena River; South Belmont Main Drain; Mills St Main Drain; Bannister Creek; Canning River, Southern River. The project aims to create awareness among the general population of their link with the river and how the actions of people, even those not living along the river affect the state of the river.

The project overarches at least 21 sub-projects funded to improve the health of the river. The projects include Ribbons of Blue; a recently completed NRM policy document for Local Government Authorities. The project also supports ongoing research, including the tributary target monitoring initiative where phosphorous and nitrogen levels are monitored along each of the tributaries every week. The results for the previous 12 months are posted along the SRT website.

## 8. PHILOSOPHY/APPROACH:

*Integrated Catchment Management: Community Empowerment.*

Central to this project is the concept of integrated catchment management. Integration in this context is multifaceted where it includes the bringing together of science and aspirations of people; the work of government alongside the support from volunteers; and integrating land management with river management. The emphasis of the project is on developing projects on the basis of the four point action plan and to maintain good involvement with the community as well as partnerships with the corporate and government sectors.

## **9. RESOURCES, MANAGEMENT AND STAFFING STRUCTURES**

The state government funds this project at a cost of \$3.5 million per year for five years. The programme has funded a number of groups and organisations. In the last 12 months, this included - \$415,000 operational costs to eight catchment groups. \$25,000 to the Swan Catchment Council to assist catchments groups to continue their activities. Forty six groups were given funds for 66 restoration projects and \$100,000 directly supported 31 of these projects. Included in the resourcing is information provision for property and catchment planning by the Swan Catchment Centre and the Department of Agriculture land management planning programme. About five people are employed by the SRT to manage the Cleanup programme.

## **10. PROCESS/METHODS USED**

The Cleanup programme is an overarching programme that runs at least 21 sub-projects all concerned with the management of the river. These sub-projects are all determined by the four point action plan. The programme works with most urban based environmental and ethics groups. Guiding the work is a recognition by the SRT that the public, if they are to be supportive and involved in the management of the river, then they must be aware of the state of the river (awareness), how their behaviour links with the river (education) and ways groups and the major sectors may be involved in various cleanup programmes (involved). The programme has involvement aspects. These include:

- Support for catchment groups (funding and technical information);
- Development of policy and management guidelines for local government to inform and enable local government river action plans;
- Supporting Ribbons of Blue a water quality education programme, encouraging children in the urban area become more involved in river activity;
- Property planning, a planning project involving the small landholdings established along the various tributaries;
- Technical and financial support is provided to the Swan Catchment Centre, an organisation whose charter is to work with catchment and community groups in all aspects of natural resource management;
- Technical and information projects such as the establishing of an artificial wetland and a drain retrofitting programme to reduce the concentration of P and N reaching the river system;
- Corporate care days, where, on a regular basis, opportunities for corporate sector staff to be involved in river management activities are enabled;
- Support is provided for Cleanup Australia Day.
- Learning opportunities are provided through the Swan River Action Kits (where learning events are part of the process) and with the Skills for Nature Conservation Community Training Programme where 404 participants attended 23 sessions during the calendar year.
- Broad community awareness is enabled through the mass media presentations.

The methods are designed to ensure that the community groups and organisations that reflect the profile of the river are provided with opportunities to be involved. Every year the SRT hold a community forum at which reports and impacts on the state of the river are reported. In 2002, 150 people attended (compared to 70 people in 2000 and 100 in 2001).

**11. IMPACTS TO DATE.**

The overall evaluation of the programme is about to begin. The task is clearly a significant one and long-term, and so while there are many short term projects established and partnerships created, the long-term impacts have yet to be felt.

One of the most significant evaluation systems established has been the regular measuring P and N concentrations in the river. This information has been made available both on the web and at community forums. Data is collected every week and provides technical advice as to the nutrient status of the river. It was found that in 2002, 93 per cent of monitored streams are within their short-term target and 67 per cent were within their long-term target. These monitoring programmes are showing that the health of the river is gradually improving. The impacts in terms of knowledge improvement and awareness is less tangible, but the number of groups involved is indicative of the capacity that is developing.

Other ways that indicate improvement in river health and knowledge of river management requirements emerge from the Ribbons of Blue programme and from the Swan River Action Kit, where 540 people were involved in learning event, 130 river action kits being distributed.

A substantial evaluation is planned for 2003.

**12. EFFECTIVENESS:**

Very high.

*Community Groups* - The number of groups participating in the programme is increasing every year. Each of the sub-regional catchments have proposals and plans for River Clean-up initiatives.

*Individuals* - The number of individuals becoming aware of the programme is increasing. There has been a steady increase in the number of people attending the annual review days held in the city. Similarly, the number of corporate organisations and training programmes have also increased.

*River Health* – Measurements of P and N are showing a gradual but steady decrease in the concentration of these elements.

**13. PROJECT DOCUMENTATION AVAILABLE:**

Swan-Canning website. Swan Canning Annual Report.

**14. ISSUES:**

The complexity and size of the river is substantial and requires that the Swan-Canning Clean-up programme maintains its community focus. The programme will need to continue to seek funds once the initial three years have finished. There appears to be significant achievements by the programme.

**15. COMMENTS/CONCLUSIONS:**

This programme is going from strength to strength. The official mid-term review will provide valuable rigour in the process. The range of initiatives is such that the needs of a range of individuals, groups and organisations are met. Significantly, the programme also has a weekly reporting on the state of the river. Computer models are also being developed to aid decision-making in P and N status.

**16. REVIEW METHODS:**

Personal interview with Ms Wendy Yorke. Reading relevant material.