



RAPID CREEK LANDCARE GROUP

YANKEE POOLS WEED MANAGEMENT PLAN

NOVEMBER 2010



RAPID CREEK

Found in Darwin's northern suburbs, Rapid Creek drains a catchment of nearly thirty square kilometres. The creek and its catchment form the only significant freshwater system in Darwin's urban area and it is a valuable community asset. Increasing development in the catchment has necessitated closer management to ensure the protection of remnant vegetation and in particular the creek amenity and its water quality.

RAPID CREEK LANDCARE GROUP

The Rapid Creek Landcare Group's members look after Rapid Creek through regular working bees, by promoting awareness about the creek and by advocating for better management throughout the catchment. The group works to implement the *Rapid Creek Management Plan* (developed in 1994 by Greening Australia and the Darwin City Council).

The group is represented on the Rapid Creek Catchment Advisory Committee. Committee members represent the major stakeholders in the catchment and are committed to improving the cooperative management of the catchment and advising the Minister on policy for management of the natural resources of the catchment.



YANKEE POOLS

This project focuses on a site at Yankee Pools on Darwin City Council land. The Council have given in principal support to these activities.

The *Management Plan* mentions "The war years saw a large influx of people to Darwin and the creek became an even more important recreational area. It was now also easily accessible. American servicemen used the freshwater section of the creek for swimming and relaxing. The swimming holes through the monsoon forest upstream of Henry Wrigley Drive, are locally known as Yankee Pools, because of this association."

THE SITE

The site is on the northern bank of Rapid Creek, just to the east of Henry Wrigley Drive (see Maps 1 and 2). There are two portions measuring one hectare in total, both belonging to the Darwin City Council. The smaller, southern triangular portion (4295) has been under Council ownership for many years. The larger, adjoining, northern portion (5249) was recently handed to the Council by the Northern Territory Government when the netball court complex was developed. The intention was to give Rapid Creek a wider buffer of native vegetation. This was negotiated through the Rapid Creek Catchment Advisory Committee.

The *Management Plan* has a vision of "a central corridor of rehabilitated bushland ...the creek will retain its natural character and ecological roles, and become a valuable natural asset in its urbanized catchment." Whilst the project site is in reasonable condition, there are a range of activities needed to meet this vision here. At present many are beyond the Council's capacity and priorities and the project represents an opportunity to address this.

WEEDS

Outbreaks of weeds have been mapped and are shown in yellow on Map 2. The weeds mainly occur in the transition community between the woodland and monsoon forest bordering the creek. The most predominant and most worrying is Gamba Grass. The following weeds are in the mapped areas and will be the target of spraying work:

- *Andropogon gayanus* (Gamba Grass)
- *Pennisetum polystachion* (Mission Grass)
- *Pennisetum pedicellatum* (Annual Mission Grass)
- *Rottboellia cochinchinensis* (Itch Grass)
- *Stachytarpheta* spp. (Snakeweeds)

ACTIVITIES

The Landcare group will work with the Council and adjoining landholders and their various contractors to determine existing management activities and will work to complement these activities. Some discussions have already commenced. Some landholders are in the process of letting weed contracts, once the outcome of these processes is known further negotiations can occur.

Proposed activities include:

- **Weed management:** Key tasks include removing tall, exotic grasses such as Gamba Grass and Mission Grass which pose a serious fire risk to the forest. Other weeds will be targeted as possible. The most serious weed is Gamba Grass which exists in small (A) to medium (B) size outbreaks. Weed management is the highest priority at the moment.
- **Revegetation:** Some areas are devoid of native vegetation and can be revegetated by planting locally provenanced seedlings of suitable native species from the various habitats on the site (see species list on page 5). As resources allow revegetation will commence on the site.

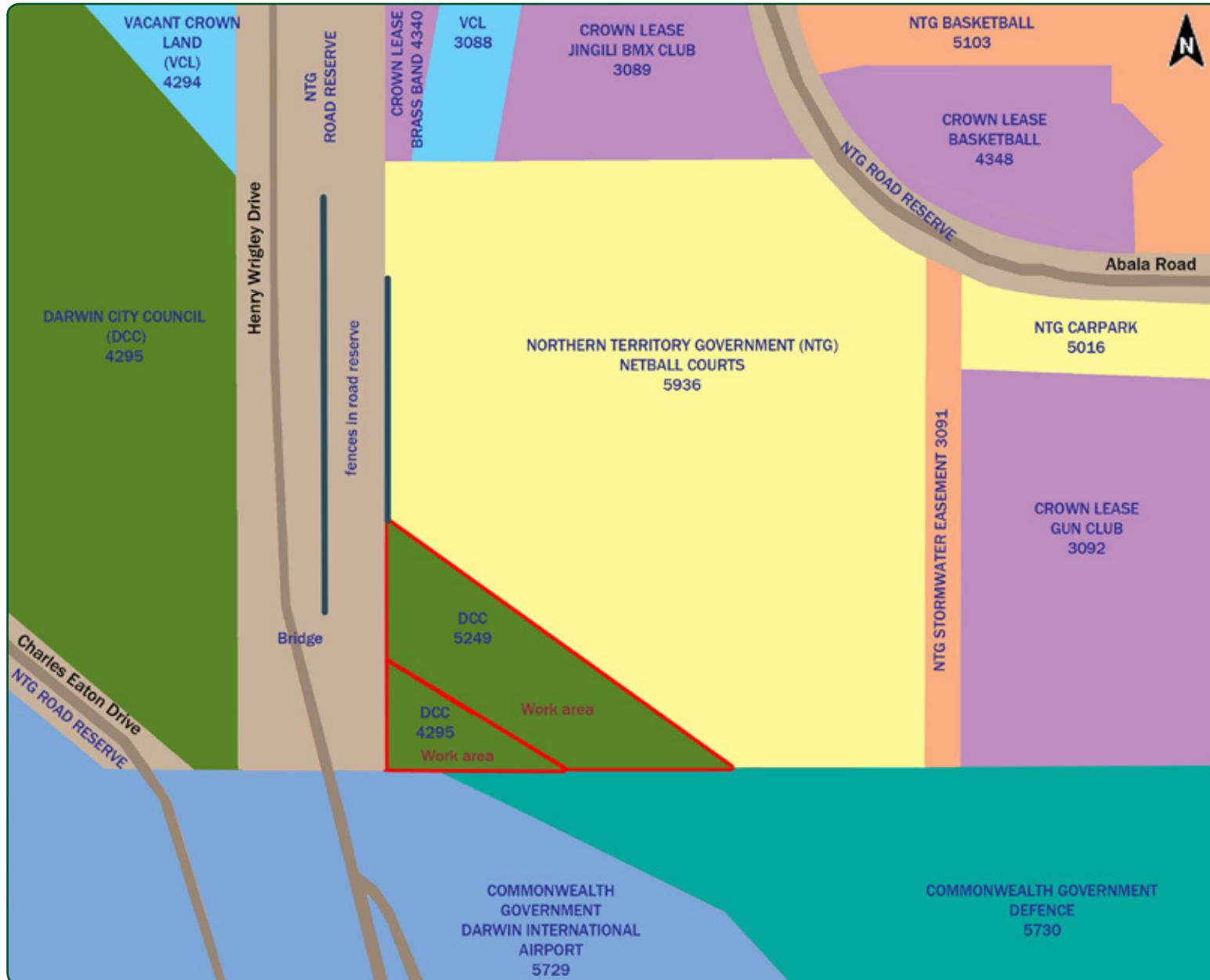
Previous activity: In March 2010 members of the landcare group worked with Greening Australia and their spray unit to spray Gamba Grass on the site. There is a need to follow this up with another spray.

ONGOING MONITORING AND MAINTENANCE

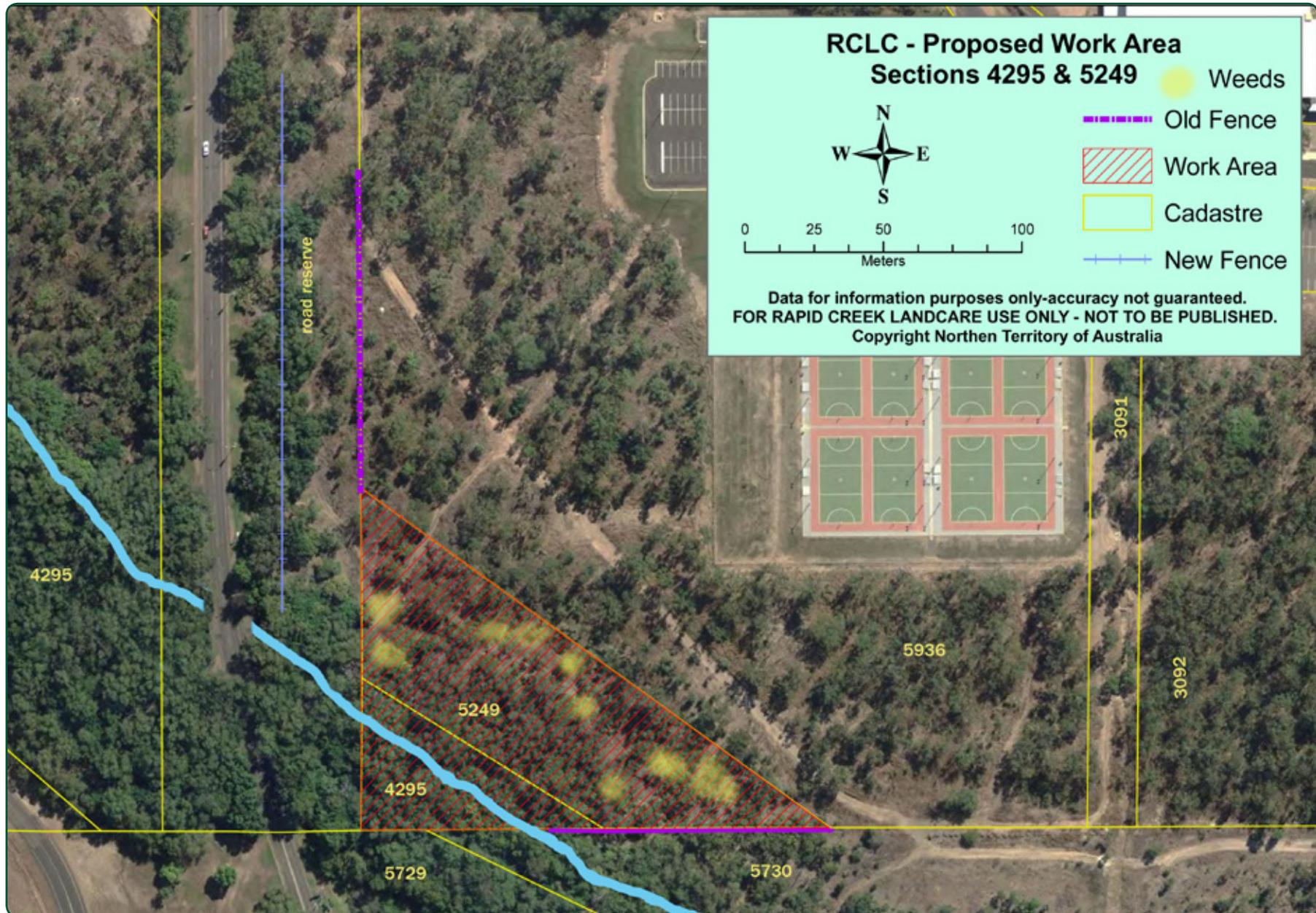
Members of the landcare group regularly visit the site and monitoring can easily be undertaken on foot. Follow up spraying will be arranged as necessary. Once the main outbreaks have been controlled ongoing spraying should be possible using backpacks which the landcare group has. Ongoing liaison with neighbours will be crucial.



MAP 1: WORK AREA AND SURROUNDING LAND TENURE



MAP 2: WORK AREA WITH AERIAL PHOTOGRAPH



SPECIES LIST FOR REVEGETATION

MONSOON FOREST

Acacia auriculiformis (Black Wattle)
Alphitonia incana (excelsa) (Soap Tree)
Alstonia actinophylla (Milkwood)
Antiaris toxicaria
Barringtonia acutangula (Freshwater Mangrove)
Breynia cernua (Breynia)
Calophyllum soulattri
Canarium australianum (White Beech)
Carallia brachiata (Carallia)
Clerodendrum costatum
Cryptocarya cunninghamii (Coconut Laurel)
Cupaniopsis anacardioides (Cupaniopsis)
Denhamia obscura (Denhamia)
Dianella odorata
Dicranopteris linearis (Hay Rake Fern)
Diospyros calycantha
Dysoxylum acutangulum
Elaeocarpus arnhemicus (Elaeocarpus)
Erythrophleum chlorostachys (Ironwood)
Eucalyptus alba
Ficus scobina (Sandpaper Fig)
Gymnanthera oblonga (nitida)
Helicia australasica (Helicia)
Ixora timorensis
Litsea glutinosa
Lophostemon lactifluus (Lophostemon)
Lygodium flexuosum (Dragon Fern)
Maranthes corymbosa (Maranthes)
Melaleuca leucadendra (Weeping Paperbark)
Melaleuca viridiflora (Broad-leaved Paperbark)
Melicope (Euodia) elleryana (Pink Euodia)
Memecylon pauciflorum (Memecylon)
Nauclea orientalis (Leichardt Pine)
Opilia amentacea
Pandanus spiralis (Pandanus)
Planchonella arnhemica (pohlmaniana)
Pleomele angustifolia (Native Dracaena)
Pouteria sericea (Pouteria)
Smilax australis (Austral Smilax)
Syzygium angophoroides (Small Red Bush Apple)
Timonius timon (Timonius)
Trema tomentosa
Uvaria holtzei

TRANSITION COMMUNITIES

Acacia mimula
Alphitonia excelsa (Soap Tree)
Auranticarpa (Pittosporum) melanosperma
Corymbia (Eucalyptus) polycarpa
Eucalyptus alba
Eucalyptus miniata (Darwin Woollybutt)
Eucalyptus tetradonta (Darwin Stringybark)
Ficus aculeata (opposita) (Sandpaper Fig)
Lophostemon lactifluus (Lophostemon)
Pandanus spiralis (Pandanus)
Petalostigma quadriloculare (Quinine Tree)
Terminalia ferdinandiana (Billy Goat Plum)

WOODLAND

Acacia dimidiata (Swamp Wattle)
Acacia mimula
Alphitonia excelsa (Soap Tree)
Alstonia actinophylla (Milkwood)
Ampelocissus acetosa (Wild Grape)
Auranticarpa (Pittosporum) melanosperma
Brachychiton diversifolius (Northern Kurrajong)
Brachychiton megaphyllum (Kurrajong)
Buchanania obovata (Green Plum)
Cycas armstrongii (Native Cycad)
Denhamia obscura (Denhamia)
Erythrophleum chlorostachys (Ironwood)
Eucalyptus miniata (Darwin Woollybutt)
Eucalyptus tetradonta (Darwin Stringybark)
Ficus aculeata (opposita) (Sandpaper Fig)
Grevillea heliosperma (Rock Grevillea)
Grevillea pteridifolia (Fern-leaved Grevillea)
Pandanus spiralis (Pandanus)
Persoonia falcata (Milky Plum)
Planchonia careya (Cocky Apple)
Syzygium suborbiculare (Cheeky Red Bush Apple)
Terminalia ferdinandiana (Billy Goat Plum)