



**ACT**  
Government

# Gungahlin Strategic Assessment Annual Report 2021-2022

Annual report for the Gungahlin Strategic Assessment and Biodiversity Plan  
for the period 1 July 2021 to 30 June 2022

**Environment, Planning and Sustainable Development Directorate, ACT Government**

**January 2023**

## Acknowledgements

The Plan Implementation Team would like to extend appreciation to the contributions made to the Annual Report by the Chief Minister, Treasury and Economic Development Directorate, the Suburban Land Agency and the Environment, Planning and Sustainable Development Directorate.

### Key Contact

Impact Assessment

Statutory Planning

Environment, Planning and Sustainable Development Directorate

GPO Box 158

CANBERRA ACT 2601

[www.planning.act.gov.au](http://www.planning.act.gov.au)

[EPDImpact@act.gov.au](mailto:EPDImpact@act.gov.au)

## Table of Contents

Acknowledgements .....	i
Key Contact.....	i
List of Abbreviations .....	iii
Executive summary.....	1
1. Background .....	2
1.1 Annual Reporting under the Plan.....	2
1.2 Commitments .....	2
1.3 Plan Implementation Team .....	3
2. Corporate outcome: Organisational effectiveness .....	3
3. Plan Implementation Team (PIT) .....	3
3.1 Background .....	3
3.2 Membership.....	3
4. Working groups .....	4
4.1 Internal working group.....	4
4.2 Consultation and engagement groups.....	4
5. Land Release Program.....	6
5.1 Gungahlin Town Centre.....	7
5.2 Jacka.....	7
5.3 Taylor .....	7
5.4 Throsby .....	8
5.5 Kenny .....	8
6. Environmental offsets .....	10
7. Report on performance by outcome/commitment.....	13
8. Independent Audit .....	24
9. Plan Review Report .....	24
10. Financial Reporting 2021-22 .....	24
10.1 Funding expenditure and variations.....	25
10.2 Financial summary .....	29
10.3 Projected 2022-23 Expenditure .....	29
10.4 Future Funding.....	30
11. Areas of Non-Compliance .....	31
Appendix 1 – Completed Commitments.....	32

## List of Abbreviations

ACT	Australian Capital Territory
ACAT	ACT Civil and Administrative Tribunal
APZ	Asset Protection Zones
BGW	Box Gum Woodland
BOP	Bushfire Operations Plans
CEMP	Construction Environment Management Plan
CIMAG	Canberra Indian Myna Action Group
CMTEDD	Chief Minister, Treasury and Economic Development Directorate
DA	Development Application
DCCEEW	Department of Climate Change, Energy, the Environment and Water (Cwth) (formerly DAWE)
DAWE	Department of Agriculture, Water and the Environment (Cwth) (formerly DoE, superseded by DCCEEW)
DoE	Department of the Environment and Energy (Cwth) (superseded by DAWE)
ED	Economic Development (Part of CMTEDD)
EDP	Estate Development Plan
EOEG	Environmental Offsets Executive Group
EOWG	Environmental Offsets Working Group
EPBC Act	<i>Environment Protection and Biodiversity Conservation Act 1999</i> (Cwth)
EPSDD	Environment, Planning and Sustainable Development Directorate (previously Environment and Planning Directorate and Environment and Sustainable Development Directorate)
FVS	Floristic Value Score
GSA	Gungahlin Strategic Assessment
GSM	Golden Sun Moth
HIP	Habitat Improvement Plan
LMA	Land Management Agreement
MNES	Matters of National Environmental Significance
NCA	National Capital Authority
OMP	Offset Management Plan
PCS	ACT Parks and Conservation Services
PIT	Plan Implementation Team
the Plan	Gungahlin Strategic Assessment Biodiversity Plan
PTWL	Pink-tailed Worm Lizard

SLA	Suburban Land Agency
SLL	Striped Legless Lizard
SP	Superb Parrot
the Strategy	Mulligans Flat Woodland Sanctuary Draft Strategy 2020 – 2045
TCCS	Transport Canberra and City Services (formerly Territory and Municipal Services Directorate)

Note: References to government agency names in this report are accurate at 30 June 2022.

## Executive summary

### ***Plan Implementation Team chairperson statement***

The Territory continued its commitment to implement the Gungahlin Strategic Assessment Biodiversity Plan (the Plan) during the 2021-2022 reporting period, one that posed additional ongoing challenges and benefits from events such as the COVID-19 pandemic and the above average rainfall for the past few years.

During 2021-22, the ACT Government released land to cater for 157 dwellings and 35,567m<sup>2</sup> of community facility land in the Gungahlin Strategic Assessment area, including the final residential land release in Throsby.

The 2021-22 financial year also saw the formal gazettal of the Nadjung Mada Nature Reserve in Kenny. This represents delivery of the final nature reserve establishment committed to in the Plan. The new name for the Kenny offset area is Ngunnawal language for 'Wet land', and is the result of engagement with the [Dhawura Ngunnawal Caring for Country Committee](#) and Winnagaay Ngunnawal Language Group. The Parks and Conservation Service (PCS) have been working hard to establish this new nature reserve, with an Offset Management Plan (OMP) in production and planning for restoration works underway.

Although the above average rainfall throughout the previous year (2020-2021) was welcomed by land managers after an extensive dry period, the ongoing wet weather into 2021-2022 has led to a number of delays in on-ground conservation and land management activities and a general increase in invasive plants across the sites. To address this challenge, a coordinated management approach is being implemented to prioritise management activities when weather conditions are suitable.

Research on the Superb Parrot and Striped Legless Lizard also continued. Whilst in 2020-21 positive observations were made in relation to the Superb Parrot, with a marginal increase in Superb Parrot breeding output observed compared to 2015 baseline data, 2021-2022 saw a dramatic decrease in breeding output, with ongoing wet weather a potential factor. A translocation plan for Striped Legless Lizard has been produced and individuals from bordering development sites are being translocated into Nadjung Mada into a special enclosure as required.

Due to ongoing impacts of the COVID-19 pandemic, funding allocations were reduced compared to previous years. Expenditure of allocated funds were further reduced, both due to COVID-19 lockdown as well as the ongoing wet weather impacts on capacity to achieve work activities. It is expected that funding allocations and expenditure will increase in the 2022-2023 year.

George Cilliers

Chair – Plan Implementation Team

Executive Group Manager

Environment, Planning and Sustainable Development Directorate

November 2022

## 1. Background

In October 2012, the ACT and Commonwealth governments commenced a strategic assessment under Part 10 of the *Environment Protection and Biodiversity Conservation Act 1999* (Cwth) (the EPBC Act). The focus of the strategic assessment was to assess the potential impacts from development of the remaining identified green-field sites in Gungahlin, the northern-most district in the ACT, on Matters of National Environmental Significance (MNES) protected under the EPBC Act.

The [Gungahlin Strategic Assessment Biodiversity Plan](#) (the Plan) was endorsed on 20 June 2013 and the actions associated with the development were approved on 17 July 2013. As a result of the approval, the Plan has streamlined the development process by removing the need for site-by-site assessment of MNES.

The Plan outlines the activities required to complete the urban development of the Gungahlin district. Accordingly, the Plan is defined by the establishment and implementation of measures to affect urban development and biodiversity conservation within Gungahlin. The Plan is relevant to the following areas as they appear in the Territory Plan:

- Urban development areas of Kenny, Throsby, Moncrieff, Jacka (north), Taylor;
- Urban development areas (currently zoned Commercial (CZ2) and Mixed Use (CZ5)) in the Gungahlin Town Centre (east precinct); and
- Conservation areas, including broad acre areas, being additions to Gorooyaroo and Mulligans Flat Nature Reserve, Kenny Nature Reserve, Horse Park north broad acre, Kenny broad acre and Kinlyside Nature Reserve.

The assessment area and Plan in summary is presented as Figure 1.

### 1.1 Annual Reporting under the Plan

This annual report is a comprehensive report on the activities related to the Gungahlin Strategic Assessment Biodiversity Plan (the Plan) throughout the preceding year, being 1 July 2021 to 30 June 2022. The annual report provides information about ACT Government activities and performance against the commitments of the endorsed Plan.

### 1.2 Commitments

The Plan identifies a range of commitments to be undertaken by the ACT Government targeting MNES affected by urban development in Gungahlin on the basis of analysis presented in the Gungahlin Strategic Assessment - Assessment Report. Commitments in the Plan build upon the long history of forward and strategic environmental planning in the ACT around the avoidance and mitigation of environmental impacts resulting from development.

In summary, the commitments include:

- Avoidance of areas that support habitat for MNES on land presently designated by the Territory Plan as developable (including RZ1 – Suburban and NUZ1 - broadacre);
- Increased investment in habitat enhancement beyond the minimum level required by ACT legislation; and
- Increased investment in research targeted at the affected MNES and guided by action planning objectives.

Direct impacts on MNES have either been avoided (Pink-Tailed Worm Lizard, Superb Parrot breeding sites, important migratory bird habitat) or minimised through protecting core, well connected endangered woodland or habitat (Box Gum Woodland, Golden Sun Moth or Striped Legless Lizard habitat).

### 1.3 Plan Implementation Team

The Plan Implementation Team (PIT) is responsible for both implementing the Plan and also ensuring that accurate records are maintained for all activities that are undertaken in relation to implementation of the Plan. PIT activities are described in the PIT Charter. Further information on the PIT is described in the relevant section of this report.

## 2. Corporate outcome: Organisational effectiveness

The strategic assessment approvals monitoring and implementation is the responsibility of the PIT, which was coordinated by the Impact Assessment team within the Environment, Planning and Sustainable Development Directorate (EPSDD) during the 2021-22 financial year.

To ensure the PIT members are informed on matters for consideration, members of each Directorate have formed an informal working group to discuss issues and make recommendation to the PIT. This model has been well received by the PIT and the working group members.

## 3. Plan Implementation Team (PIT)

### 3.1 Background

The PIT is responsible for all aspects of implementation of the Plan in addition to ensuring accurate records are maintained of all activities that are conducted in relation to implementation of the Plan. Commitment 6 of the Plan describes the requirement of the ACT Government in establishing a PIT.

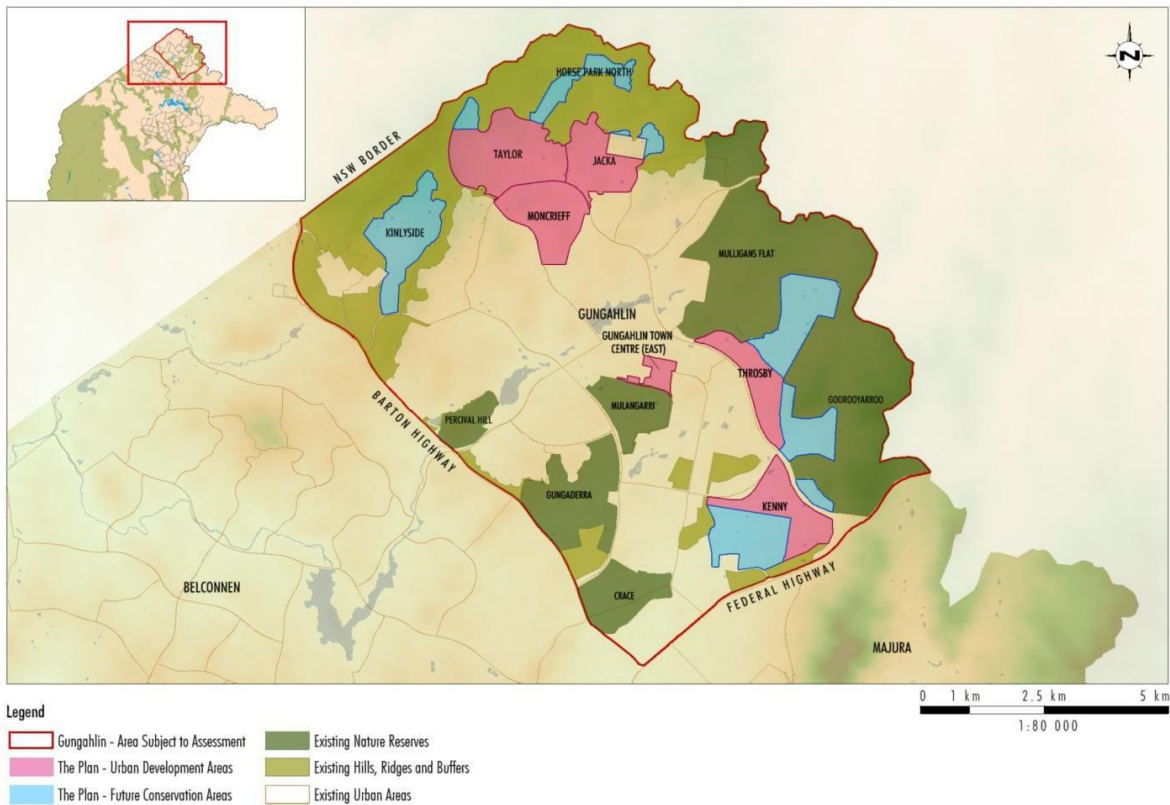
The PIT was established in 2014 and was a multi-agency group drawn from executives within the EPSDD (former Environment and Planning Directorate), Chief Minister, Treasury and Economic Development Directorate (CMTEDD) and coordinated by Economic Development (ED), CMTEDD. However, from 1 July 2016 the responsibility for compliance monitoring and reporting was assigned to Statutory Planning (previously Planning Delivery), EPSDD. The PIT membership was reviewed in response to the ACT Directorate restructure. The revised PIT membership and Charter was approved by the former Commonwealth Department of Environment on 13 January 2017.

The PIT will operate for the 20-year life of the Plan. Upon conclusion of the Plan, ongoing management responsibility will divest in the appropriate ACT Government agencies. The PIT will ensure the appropriate transfer and accessibility of information gathered over the life of the Plan. The PIT will operate with a mandate to ensure a whole-of-government approach to implementation of the Plan.

### 3.2 Membership

PIT members include executive representation from EPSDD and CMTEDD. As of 30 June 2022 the PIT comprised:

- Statutory Planning, EPSDD (Lead Directorate);
- Environment, Heritage and Water Division, EPSDD;
- Suburban Land Agency, EPSDD;
- Policy and Cabinet, CMTEDD; and
- Treasury, CMTEDD.



**Figure 1: Overview of the Plan**

## 4. Working groups

### 4.1 Internal working group

The Gungahlin Strategic Assessment Working Group and Environmental Offsets Working Group (EOWG) comprises members from multiple divisions within the EPSDD. These working groups meet regularly during the year to discuss implementation and delivery of the commitments under the Plan.

During 2020-21, the ACT Government also established the Environmental Offsets Executive Group (EOEG). The EOEG, with the support of the EOWG, provides cross directorate executive oversight of offsets within the ACT. This includes the provision of advice and recommendations on offset matters and making decisions where appropriate.

### 4.2 Consultation and engagement groups

PCS undertakes extensive stakeholder engagement across the management of its offset sites, throughout the planning, monitoring, research, and operational management processes.

Stakeholder engagement has been increasing in areas surrounding the Kinlyside Nature Reserve and Jacka, Taylor, and Horse Park North avoidance areas, where surrounding residential development continues. The development of new suburban estates adjacent to offset sites has provided an opportunity for PCS Rangers to engage with these new communities.

As the demographic of residents vary, some of PCS's public engagement for 2021-2022 have focused on education on the natural areas surrounding the residents' homes, the opportunities to learn and discover more about these natural areas, and the types of behaviours that are appropriate when visiting them.

Ongoing engagement between PCS and the Suburban Land Agency (SLA) Communications Team ('Mingle'), has enabled PCS to deliver and promote offset and conservation messaging via community events, online and newsletter articles. In particular, a suite of community engagement tools has been developed over 2021-2022 for deployment at Taylor that are focused on enhancing community understanding of the conservation values at their doorstep. The intention is that, through art-based and nature-based activities, Taylor residents will gain a better understanding of, appreciation for, and willingness to protect the significant conservation values of Taylor avoidance area adjacent to resident homes.

To the east, the Throsby and Kenny broadacre offset areas are now protected within the Mulligans Flat Woodland Sanctuary predator proof fence. The Sanctuary is managed by a partnership between:

- The ACT Government, which manages the land and infrastructure and undertakes research;
- The Woodlands and Wetlands Trust, which undertakes education and outreach; and
- The Australian National University (ANU), which undertakes research and reintroduction of fauna species.

The partnership developed a draft Mulligans Flat Woodland Sanctuary Draft Strategy 2020 – 2045 (the strategy) for the Sanctuary that includes management of the offset areas. This strategy was produced with consultation from the public and was due for release in June 2022.

In 2021, the Nadjung Mada Nature Reserve was gazetted, and PCS establishment activities commenced. Concurrently, the commencement of the development of the East Gungahlin High School on the northern boundary of the reserve has resulted in ongoing stakeholder discussions, particularly relating to storm water management as construction progresses. Early engagement with SLA ahead of the planning for the future residential development of Kenny has resulted in the drafting of Interface Guidelines to better direct planning of suburban development that interacts with Nature Reserve boundaries.

PCS has worked closely with other key stakeholders who assist with the management of the Gungahlin Strategic Assessment offset sites, including:

- Non-Government Organisations such as [WaterWatch](#), [Friends of Grasslands](#), [ParkCare](#) and [Canberra Ornithologists Group](#).
- [Greening Australia](#) (for example, PCS is working with Greening Australia to develop a restoration plan for Throsby and Nadjung Mada).
- A selection of Aboriginal business, contracted to deliver restoration works
- The [Dhawura Ngunnawal Caring for Country Committee](#) (for example, to develop the new interpretive signage on the 'Walk Through Time' stage 2 guided walk in Mulligans).
- [Representative Aboriginal Organisations](#), as declared under Section 14 of the *Heritage Act 2004*, including:
  - *Buru Ngunawal Aboriginal Corporation*;
  - *King Brown Tribal Group*;
  - *Mirrabee*; and
  - *Ngarigu Currawong Clan*.
- Current lessees and agistment license holders (including at Kinlyside Nature Reserve and at the Kenny offset and development area).
- The [Woodlands and Wetlands Trust](#) (including for the opening of the new Wildbark Centre in late 2022).
- Universities such as the [Australian National University](#), [University of Canberra](#) and [Canberra Institute of Technology](#).

- Utility providers with infrastructure located near or within reserves, such as [ActewAGL](#), and [ICON water](#).

Other ACT and Commonwealth Government agencies that are engaged through the management of the Gungahlin Strategic Assessment area include:

- The [ACT Heritage Council](#), for advice and approvals that are required for Aboriginal heritage management matters (a Heritage Festival Walk was also conducted in the Throsby area).
- [Australian National Herbarium](#). Voucher specimen submissions by the monitoring team to the herbarium, including a record of a new species for the ACT from Throsby North (*Gnaphalium indutum* – Tiny Cudweed), as well as collaboration for confirmation of flora species ID's.
- [Transport Canberra and City Services Directorate](#), regarding maintenance of grass, roads and tracks around suburbs and nature reserves, among other important city services.
- As stated above, PCS also consults extensively with SLA, especially in relation to boundary issues where developments abut nature reserves or avoidance areas.
- The ACT Government Education Directorate for consultation and discussion relating to the development of the East Gungahlin High School.

During the 2021-22 financial year, PCS held a number of engagement activities, although some planned activities were unable to go ahead due to COVID-19 lockdowns and restrictions on public gatherings. These activities included:

- The heritage festival walk through of the Throsby offset.
- Interpretative activities at Taylor community events which included children's activities, ranger engagement and educational material on PCS reserves.
- Media engagement with the Canberra Times, ABC Canberra Radio and ABC News.
- Facebook posts with values-based messaging promoting positive visitor behaviours. An example is in the following link:  
[ACT Parks and Conservation Service - The secret work of trees | Facebook](#)
- Volunteers supported Autumn restoration plantings in Nadjung Mada Nature Reserve.

## 5. Land Release Program

As reported in previous annual reports, each year the ACT Government prepares a four-year Indicative Land Release Program setting out the ACT Government's intended program of residential, commercial, industrial and community land releases. The Program is indicative and is subject to change as market conditions alter or as ACT Government priorities adjust. The Planning and Urban Policy Division (previously Planning, Land and Building Division) of EPSDD is responsible for preparing the program in conjunction with other relevant Territory directorates.

The ACT Government plans for the supply and release of land, taking account of factors such as forecast population changes, household changes, demand for land and the capacity to cost effectively deliver key infrastructure and services.

The four-year Indicative Land Release Program enables the ACT Government to deliver on its economic and social strategies for the Territory. However, due to the COVID-19 pandemic and the associated delay of the 2020-21 ACT Budget, a detailed Indicative Land Release Program was not released. Rather, the details were included in the ACT Government's [August 2020 Economic and Fiscal Update](#).

The [ACT Indicative Land Release Program 2021-22 to 2025-26](#) included the following release targets for Gungahlin during 2021-22:

- 757 dwellings
- 34,171 m<sup>2</sup> of commercial site area
- 8,995 m<sup>2</sup> of community facility site area

The actual 2021-22 land release for Gungahlin was:

- 157 dwellings

More information about the Indicative Land Release Program is available on the following website: <https://www.planning.act.gov.au/planning-our-city/land-release>.

## 5.1 Gungahlin Town Centre

The Gungahlin East project approved in 2017 finished civil construction in 2018-19 with site releases to developers and occupiers commencing in February 2019. The remaining commercial, community and residential sites will be sold in line with the Indicative Land Release Program.

Territory Plan Variation 364 (TPV364) including amendments to the Gungahlin Precinct Map and Code came into effect 24 June 2022 and will apply to future development applications in this area.

With Development of the Gungahlin Town Centre a matter of note to relevant stakeholders, the ACT Government is undertaking a place-based engagement to help inform future releases. The engagement will support the outcomes TPV364 and the aspirations of the new planning system, helping improve line-of-sight from planning strategy to development outcomes.

As a result of this engagement process releases scheduled for the Town Centre in the 2021-22 financial year were deferred.

## 5.2 Jacka

The future urban areas of Jacka are expected to deliver around 700 additional residential dwellings. A Development Application (DA) covering this first stage (500 dwellings) was approved on 20 October 2021. A subsequent application for review of this decision was lodged by a third party on 18 November to the ACT Civil and Administrative Tribunal (ACAT). The ACAT proceedings were not finalised until March 2022, with a revised Notice of Decision approving the DA taking effect 15 July 2022.

As a result of this delay in planning approval, the 200 residential dwellings identified in the 2021-22 ILRP could not be released and were deferred to 2022-23.

It is anticipated construction of Jacka 2 will commence from early 2023, with the first releases to be held late in the 2022-23 financial year. The first residents are not expected to move in 2024.

## 5.3 Taylor

The major civil works in Taylor are completed with minor landscaping to the final stage being undertaken in Stage 3 along with the installation of shade sail and edge treatment to the adjacent Nature Reserve. Land release and sales in accordance with the Indicative Land Release Program have been completed.

The Margaret Hendy Primary School, opened in 2019 and future High School is under construction expected to be open for the 2024 school year. The Local Centre site is currently for sale under a tender process and is expected to conclude by June 2023.

## 5.4 Throsby

Throsby estate construction was completed in 2017. All land release and sales in accordance with the Indicative Land Release Program have been completed, with the final block settling in September 2021.

A Government primary school opened in 2023. The school includes high quality learning environments, incorporating both indoor and outdoor learning areas, as well as integrated spaces to support students with specialised needs. The school will provide additional community facilities for the area and will include a large community room and kitchenette, multipurpose double gym, sports courts and change-room facilities, outdoor turf sports field and outdoor multipurpose hardcourts.

The 'Home of Football' will be built at Throsby and will be the new headquarters for football in the ACT. It will feature multiple outdoor fields, indoor futsal courts, office space for Capital Football, and associated amenities.

## 5.5 Kenny

The first land being developed in Kenny is for the new East Gungahlin High School, which is currently under construction. The proposed suburb of Kenny was managed under a rural lease during 2019-20. An initial localised release to facilitate delivery of the future East Gungahlin High School is scheduled for 2020-21. EPSDD is continuing, with due diligence, to determine the most suitable outcomes and development options for this suburb. Preparation of an Estate Development Plan (EDP) is expected to commence in 2021-22.

The Territory Plan Variation ([379](#)) to rezone land within the future suburb to formally establish the Kenny Nature Reserve (now Nadjung Mada Nature Reserve) commenced during 2020-21 and was approved by the Minister for Planning and Land Management on 2 August 2021. The Nadjung Mada Nature Reserve environmental offset site, as presented in the Plan Variation and adjacent indicative land uses is presented in Figure 2.

There are a range of ecological and hydrological issues at Kenny that are being further investigated by ESPDD to ensure the protection of the recently created Nadjung Mada Nature Reserve adjacent to the future urban area of Kenny.

At this stage, it is expected Kenny will accommodate up to 1500 dwellings, with a mix of housing choice, including affordable, public and community housing, along with education facility, and local commercial operations noting that the ecological and hydrological issues currently being investigated may have an impact on the future EDP.

### **Kinlyside**

The Kinlyside Nature Reserve was created and gazetted through a Territory Plan Variation on 6 November 2014. The Nature Reserve includes a large section of land adjacent to Casey. The primary objective of establishing the offset area was to permanently protect and enhance the extent and quality of the White Box - Yellow Box - Blakely's Red Gum Grassy Woodland community and the population and habitat of the Golden Sun Moth. Kinlyside Nature Reserve includes some areas of land managed under rural lease for agricultural purposes. Existing leases are periodically monitored and reviewed to ensure optimal conservation biodiversity outcomes in line with the Plan and the [Kinlyside Offset Management Plan](#). The site is currently being reviewed for a potential variation to the boundary to increase the Nature Reserve size. Updates on this process will be provided in the next annual report.

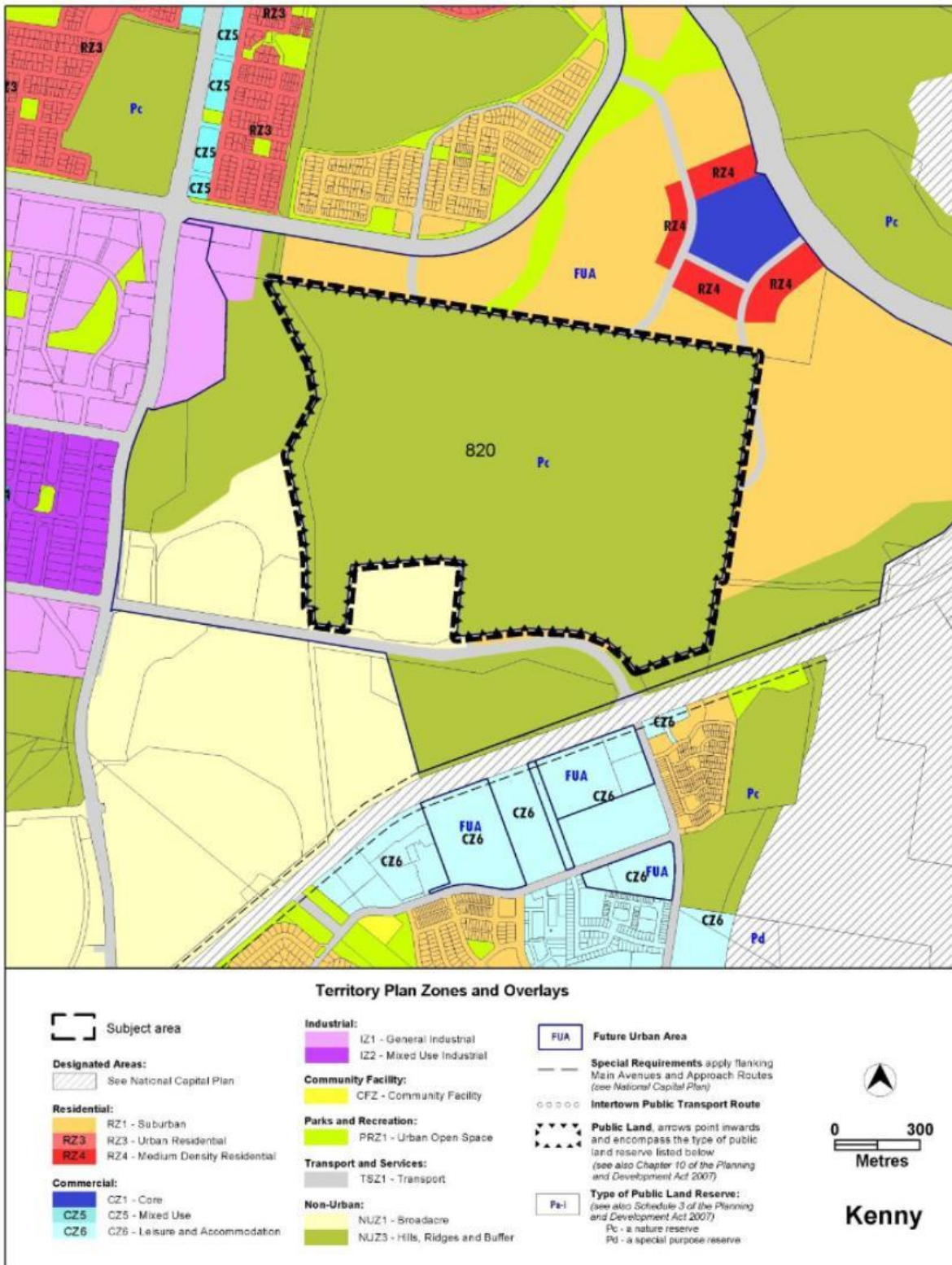


Figure 2: Kenny offset area and potential land use zones for Kenny

## 6. Environmental offsets

Environmental offsets are measures that compensate for residual adverse impacts of an action on the environment. Offsets provide environmental benefits to counterbalance the impacts that cannot be avoided once avoidance and mitigation measures have been considered. Offsets can take the form of direct offsets, indirect offsets or other compensatory measures.

**Table 1** below highlights the condition of offset sites established through the GSA. The information presented in **table 1** is based on monitoring data gathered by ACT Government ecologists and consultants. Further detail is also provided in **table 3** where links to source data are provided.

It should be noted that this does not include other offset areas located within the GSA region that relate to developments outside the scope of the Strategic Assessment, such as Budjan Galindji Nature Reserve offset area (previously Franklin Grasslands) which offsets the impacts from the Dudley Street upgrade in Yarralumla (EPBC 2017/8072).

All offset areas in the GSA, with the exception of Nadjung Mada Nature Reserve (Kenny offset area), were formally established through [Territory Plan Variation 319](#) in November 2014. In August 2021, the Nadjung Mada Nature Reserve was formally established through [Territory Plan Variation 379](#).

**Table 1 – Gungahlin Strategic Assessment Offset Areas – Condition Status**

Offset name	MNES	Condition status at 2021-22
Kinlyside	Box Gum Woodland (BGW) Golden Sun Moth (GSM) Pink-tailed Worm Lizard (PTWL)	<p>The BGW within Kinlyside represents the largest area of high quality BGW vegetation within any offset area in the ACT. Results from the spring 2020 survey season recorded that, on average, over 100 ha of BGW was above benchmark for the floristic value score (FVS) – representing a very high diversity of native ground cover plant species across the site. While FVS also decreased for vegetation condition zone 16.1 in 2021, values remained above benchmark and an increase from 2019. Native ground cover also decreased in 2021 across the site, though it was still above benchmark and this pattern was observed across other monitored sites suggesting the continued wet conditions and subsequent high grass biomass and low bare ground may have impacted diversity (through smothering of forbs).</p> <p>In the past year, grass height has recovered dramatically to within benchmark ideals with the increase in rainfall during 2020-2021 and 2021-2022. The following weed species have been flagged with land managers as being above asset protection levels for 2021 in the BGW at Kinlyside: Patterson’s Curse, Serrated Tussock and St John’s Wort. Land managers will manage these weed species through a variety of management activities, including spraying, grazing and controlled burns.</p> <p>A stable population and distribution of GSM has been recorded at Kinlyside annually since 2015. From 2016-2019, over 50% of transects have recorded occupancy by GSM and seasonal variation in population which may be explained by annual climatic influences. Due to the unsuitable conditions for GSM emergence during the flying season in 2021 and 2022, very few individuals (&lt; 3) were recorded across the site. However, a single year of data should not be used to infer a decline in this species given the specific conditions required for emergence and ability of the larvae to remain dormant underground. Kinlyside represents some of the best quality GSM habitat in northern ACT, with very high cover of Wallaby Grass across the site, and grass tussock height and bare ground cover favourable to the species.</p> <p>As all impacts to PTWL were avoided through the GSA, there was no requirement to offset. Despite this, PTWL habitat is known to occur in Kinlyside and therefore was subject to early mapping and monitoring in 2016, with presence of one individual recorded on the site. The Monitoring Program for Environmental Offsets strives to monitor MNES as per commitments, and broader biodiversity values outside of commitments to better understand the values at a landscape scale. As such, PTWL population surveys using a newly developed low-impact technique will be set up in 2022, to be commenced from 2023 onward.</p>
Taylor	BGW	<p>The Taylor offset site has recorded very high quality BGW since surveys began in 2018. In particular, the proportion of native ground cover and FVS is high across the site, with the exception of the southern area adjacent to the new urban development (subject to higher levels of disturbance due to proximity to the urban edge).</p> <p>As a result of high grazing pressure from overabundant native grazers (Eastern grey Kangaroos) and pest species (European Rabbits), average grass height has stayed at a concerning low (at or below 5 cm leaf tussock height) for three years. This has the potential to impact on the BGW understorey and regeneration potential. To address this, livestock grazing has been removed and other strategies such as erecting temporary kangaroo exclusion fencing are being explored.</p> <p>St John’s Wort weed species have been flagged with land managers as being above asset protection levels for 2021 in the BGW at the Taylor offset site, with Serrated Tussock levels now below asset protection levels as a result of intense management. Land managers will continue to manage these weed species through a variety of management activities, including spraying, grazing and controlled burns.</p> <p>Opportunistic targeted surveys for GSM were undertaken in 2020 at the Taylor offset site, and again in 2021. In 2020, a small population was confirmed in the south of the offset, in the area bordering the new urban development, however 2021 surveys recorded no individuals. This is likely due to the unsuitable conditions for GSM emergence during the flying season in 2021. However, a single year of data should not be used to infer a decline in this species as mentioned above for Kinlyside. Further opportunistic surveys for GSM may be undertaken should resourcing permit to complete 3-year baseline surveys and give an insight into the population at this site, but are not a core commitment for the Taylor offset site. Further, GSM habitat surveys will be undertaken in spring and summer 2022 in this site.</p>

Offset name	MNES	Condition status at 2021-22
Horse Park North	BGW	<p>The Horse Park North offset area demonstrates some of the highest quality BGW across ACT offset areas. The BGW area hosts a high proportion of native ground cover, and an above benchmark FVS across the site, with the exception of the low-quality area in the southern area adjacent to the new urban development (subject to higher levels of disturbance due to proximity to the urban edge).</p> <p>In 2021, Serrated Tussock and St John's Wort was recorded at an above asset protection level density. Land managers will continue to manage these weed species through a variety of management activities, including spraying, grazing and controlled burns.</p> <p>Opportunistic targeted surveys for GSM were undertaken in 2020 at the Horse Park North site and again in 2021. A small population was confirmed in the centre of the offset in 2020. Due to the unsuitable conditions for GSM emergence during the flying season in 2021, no individuals were recorded across the site for that year. Further opportunistic surveys for GSM may be undertaken should resourcing permit to complete 3-year baseline surveys and give an insight into the population at this site, but are not a core commitment for the Horse Park North offset site. Further, GSM habitat surveys will be undertaken in spring and summer of 2022 in this site.</p>
Jacka		<p>The GSA outlines that the Jacka offset site does not contain any MNES but includes the area for strategic benefit primarily for habitat connectivity. Therefore, no monitoring surveys are conducted at this site.</p>
Throsby North	BGW GSM Superb Parrot (SP)	<p>The BGW in the north of the site demonstrates high quality areas with high native ground cover and some areas of above benchmark FVS. There is high variability across the BGW areas, with several sites recording FVSs and native ground cover below benchmark, particularly in areas in the south of the site where Phalaris cover is high. The native ground cover and FVS in 16.2 has shown an increase in 2021 compared to 2020, though values are still below benchmark.</p> <p>In spring of 2020, a new species for the ACT was recorded in a floristics plot in the north of Throsby North, <i>Gnaphalium indutum</i> (Tiny Cudweed), which has been lodged with the herbarium. During spring surveys in 2021, the plot that recorded Tiny Cudweed in 2020 was searched for the species, and it was again located (with several healthy plants observed).</p> <p>Patterson's Curse weed species have been flagged with land managers as being above asset protection levels for 2021 in an area of BGW at Throsby North, however this is a decrease from 2020 observations. Land managers will manage these weed species through a variety of management activities, including spraying, grazing and controlled burns.</p> <p>There was a reduction in the density and distribution of GSM at Throsby North in 2021, with only 1 individual recorded during the survey season. However, this is likely due to unfavourable conditions for the species caused by La Nina as a drop in numbers was mirrored at sites across the ACT.</p> <p>While there are some potential nesting trees, no SP have been recorded nesting at Throsby North. This is likely due to their preference to nest in proximity to each other, and with more suitable nesting trees being located at Throsby East.</p>
Throsby East	BGW SP	<p>Throsby East represents low quality BGW found in ACT offset areas. This is a consistent result recorded annually and reflects a poor diversity of native ground species and a low percentage cover of native ground cover. However, there are areas with above benchmark native ground cover, representing restoration opportunities.</p> <p>In the 2021 survey year, no high threat weeds were recorded as being over the asset protection level in the BGW at Throsby East.</p> <p>GSM was not surveyed in 2021 in Throsby East as it was not scheduled, though it is currently known to support low density numbers of the species.</p> <p>Throsby East supports one of only two known breeding colonies of SP in the ACT, with 15+ nests located in the offset area. There is a high density of quality nesting hollows in stands dominated by <i>E. rossii</i> and <i>E. blakeyli</i>. Despite this, only 13 Superb Parrot young were raised in the offset site in 2021. This represents a dramatic decline compared to previous years, as well as the pre-development baseline (2015). The most likely driver of this very poor reproductive output relates to a significantly wetter La Nina season, which may have impacted the redistribution of nest competitors and predators in the landscape. For example, the first predation of SP young observed by gliders in 2021.</p> <p>Avian competition for nesting sites is significant, but the SP has been consistent with its breeding success in the site up until the 2021 season.</p>
Kenny broadacre	BGW Striped Legless Lizard (SLL)	<p>The Kenny Broadacre BGW represents the highest number of mature trees, coarse woody debris, and percentage of native overstorey cover of any offset area in the ACT. However, the FVS and native ground cover diversity at this site is consistently low. In 2021, the native cover significantly decreased across monitored plots, with EPBC BGW 16.2 decreasing from a recorded 100% to under 10%. The reduction in native diversity in 2021 compared to 2020 was observed across other sites, likely as a product of continued wet conditions and subsequent high grass biomass and low bare ground potentially impacting diversity (through smothering of forbs). Kenny Broadacre is set to be surveyed again for floristics in 2023.</p> <p>In the 2021 survey year, no high threat weeds were recorded as being over the asset protection level in the BGW at Kenny Broadacre, though St John's Wort was observed to increase on 2020 recorded densities. The population of SLL recorded at Kenny Broadacre appeared to decline from 2018 to 2019, with no individuals recorded in 2019. During this time there was reduced grass height due to drought. Due to increased suitable habitat from rainfall increasing grass biomass to levels favoured by the species and altered grazing regimes, an increase in SLL in 2020 and 2021 was recorded, as expected, with consistent numbers over these 2 years.</p>
Nadjung Mada (Kenny)	BGW SLL	<p>During 2020-2021, the Nadjung Mada Nature Reserve came under PCS management. It represents low quality BGW found in offset areas. This is a consistent result recorded annually and below benchmark FVS reflect a poor diversity of native ground species. The site however does demonstrate a higher percentage of native ground and mid-story cover than other offset woodland areas. Though in 2021, the native cover in 16.2 and 16.5 decreased from 2020, being below benchmark in 16.5.</p>

	SP	<p>Serrated Tussock and Patterson’s Curse weed species have been flagged with land managers as being above asset protection levels for 2021 in the BGW. Land managers will manage these weed species through a variety of management activities, including spraying, grazing and controlled burns.</p> <p>The population of SLL at this site is currently extremely low. Surveys from 2018 to 2020 recorded a significant decline in the population compared to previous surveys in 2012 and 2015, with the first single individual recorded by PCS Ecologists in 2020. Under new PCS management, altered/reduced grazing regimes and increased weed control, in addition to increased rainfall (returning biomass to levels favoured by the species) was expected to result in increasing numbers of the species in future surveys, which eventuated during 2021 season surveys with 4 individuals found across the site.</p> <p>A translocation plan has been produced and individuals from bordering development sites are being translocated into the reserve into a special enclosure as required.</p> <p>Nadjung Mada Nature Reserve contains trees that are critical to Superb Parrot movement through the wider landscape. Superb Parrot movement through Kenny is particularly important to maintain as many of the individuals using these trees are active breeders (at Throsby East). They have been recording using the corridor multiple times daily during breeding season to source food for their young. Characteristics that make the trees on Kenny suitable for SP movement include their height (&gt; 10 m), species (<i>E. melliodora</i>), crown (healthy) and age (mature/large). At least 40 trees within the reserve contain these characteristics.</p>
--	----	---

## 7. Report on performance by outcome/commitment

Table 2 below describes the commitments from the Plan and the status of each commitment. Items reported as complete at the end of the 2021-2022 reporting period are attached to this report (**Appendix A**) for reference.

**Table 2 – Gungahlin Strategic Assessment Commitments – Status**

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
1	Variation to the Territory Plan and amendment to the National Capital Plan for all proposed land use changes (including creation of Nature Reserves) in accordance with the Plan.	EPSDD/NCA	<p>Timing for the establishment of nature reserves is linked to relevant development activities. All nature reserves committed to in the plan have now been formally incorporated in the reserve system.</p> <p>The DA for stage 1 of the Jacka 2 estate was publicly notified in June 2020. Subject to planning approvals, construction of the estate is scheduled to commence in 2021. The masterplan for this estate includes formalisation of the existing wetlands in the south and the future hills, ridges and buffer zones to the north.</p> <p>Approximately 95% of the proposed developable area within Taylor has been released with the remainder scheduled for release in 2021-22, in accordance with draft Indicative Land Release Program.</p>	<p>All nature reserves and offset areas, with the exception of Kenny, were established under <a href="#">Territory Plan Variation 319</a> in November 2014.</p> <p>Nadjung Mada Nature Reserve (Kenny) was formally approved in 2021, via Territory Plan Variation 379. Please see commitment item 21 below for details</p> <p>Other land use changes have been and will continue to be uplifted after relevant EDPs are approved.</p>
3	Provide documented guidance on the development of concept plans to ensure appropriate land use planning for areas adjacent to MNES habitat and associated buffers for all urban development including specific consideration of the estate design/layout. This is inclusive of requirements for Asset Protection Zones (APZ) between the buffer zone and any residential development.	PIT	<p>Concept plans or similar planning documents (structure plans or planning and design frameworks) may not be required for all suburbs.</p> <p>Guidance documents have been prepared for Throsby, Taylor and Moncrieff. Due to the progress development lifecycle stage of these developments, there is limited need or scope for changes to the strategic plans and frameworks.</p> <p>Land release in Moncrieff and Taylor is very close to being finalised, with the final residential land released in Throsby during 2020-2021.</p> <p>Guidance documents for Kenny will be prepared as required.</p>	<p>Ongoing.</p> <p>This will occur prior to lodgement of EDPs for each suburb. The specific timing will be determined as required by each development area.</p>
4	Review and update Land Management Agreements (LMA) or management plans for all avoided areas of NUZ3 – Hills, Ridges and Buffers to ensure consistency with, and application of commitments of the Plan. As a part of this action, baseline condition assessment of all avoided areas including NUZ3 will be undertaken and LMAs will include conditions for compliance and enforcement.	EPSDD - PCS	<p>Negotiations for review and update of LMAs occurs where necessary between EPSDD and rural lease holders.</p> <p>The LMA for the leased area of the Kenny offset site is no longer required as the lease was withdrawn during 2020-2021 and the site transitioned to Nature Reserve. This land is now under the custodianship and management of PCS.</p> <p>One LMA that applies to Kinlyside Nature Reserve is up to date, the second is currently being reviewed and negotiated.</p> <p>Agistment licenses for all areas where stock is required are managed by PCS.</p> <p>Licences have been prepared under section 273 of the <i>Nature Conservation Act 2014</i> to enable rural lease holders to undertake various land management activities in avoided hills, ridges and buffer zones (NUZ3).</p> <p>Baseline assessment of areas has been completed in accordance with commitment items 13 and 14.</p>	<p>Ongoing.</p>
5	Implement cat containment policy in all urban development areas.	TCCS	<p>The following GSA suburbs were declared cat containment areas under the <i>Domestic Animals Act 2000</i>:</p> <p>Bonner, Crace, Forde, Gungahlin Town Centre east, Jacka, Moncrief, Taylor and Throsby.</p> <p>In 2021, the <a href="#">Cat Plan 2021-2031</a> was released. The Cat Plan sets a number of strategies and actions to guide the management of cats in the ACT. Implementation of the plan and the associated strategies will be guided by the <a href="#">ACT Cat Plan Implementation Plan</a>.</p>	<p>Complete for all suburbs except Kenny where development has not commenced.</p> <p>See <a href="#">DI2019-33</a></p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
9	Develop a Reserve Management Plan for all new nature reserves in order to provide for adaptive management and condition improvement of the reserve in accordance with the objectives and commitments of the Plan.	EPSDD - PCS	<p>Offset Management Plans (OMPs) and the supporting habitat improvement plans are published on the <a href="#">Environmental Offsets Register</a>:</p> <ul style="list-style-type: none"> <li>• <a href="#">Kinlyside OMP 2015</a></li> <li>• <a href="#">Throsby and Kenny broad acre OMP 2015</a></li> <li>• <a href="#">Box Gum Woodland and Derived Native Grassland Condition Improvement Plan 2015</a></li> <li>• <a href="#">Golden Sun Moth Habitat Improvement Plan 2015</a></li> <li>• <a href="#">Striped Legless Lizard Habitat Improvement Plan 2015</a></li> <li>• <a href="#">Superb Parrot Habitat Improvement Plan 2015</a></li> </ul> <p>Note: Reserve management plans for existing nature reserves are expected to evolve over time and OMP reviews will be conducted when required.</p> <p>The OMP for the newest reserve, Nadjung Mada is in production.</p>	<p>Kinlyside and Throsby OMPs – Completed. Review of these OMPs may occur in 2022-23</p> <p>Nadjung Mada Nature Reserve – The initial OMP is currently being drafted, with a draft expected to be submitted to the Commonwealth in 2022-23.</p>
11a	Review and approve (subject to compliance with the Plan) Construction Environment Management Plans (CEMP) submitted for all new construction projects within the area subject to the Plan.	PIT	<p>CEMPs are required to be submitted and approved prior to the commencement of construction in development and conservation areas in the Plan.</p> <p>In 2020-2021, one CEMP was submitted (for the Taylor 2 Stage 2C development) and is currently still undergoing review to ensure compliance with the GSA biodiversity plan and the approved framework for CEMP's.</p>	Ongoing.
12	Coordinate with TaMS – Asset Acceptance to ensure all obligations of contractors with respect to management of MNES in accordance with the Plan have been implemented prior to hand-over of assets to the Territory.	PIT	<p>Prior to practical completion of each development contract. TCCS (formerly TaMS) will engage with the appropriate persons within their Directorate to ensure this requirement is achieved.</p> <p>All DA, including EDPs in the GSA, are referred to the Impact Assessment team to ensure compliance with the Plan. Conditions are placed in DA and EDP approvals to ensure obligations with respect to management of MNES during construction are implemented.</p>	Ongoing.

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
14	Ongoing collection of key ecological information for reporting requirements.	EPSDD - monitoring and PCS	<p><b>Golden Sun Moth (GSM)</b></p> <p>GSM <i>habitat condition</i> monitoring was undertaken at all offset sites in 2018, 2019, 2020 and 2021 as part of annual herbage mass assessments.</p> <p>2020 was the last year of 3-year baseline data collection for all monitoring sites. Future results will be compared to the baseline to determine any ecological changes brought on by management actions or variability in climatic conditions.</p> <p>Kinlyside and Throsby North have been monitored annually for GSM population from 2015-2021, while Throsby East was monitored in 2016, 2018, 2019 and 2020. Preliminary results show that GSM at Throsby North has increased in distribution and abundance by 20% per year from 2015 to 2019, with the highest numbers recorded in 2019. There is no clear trend at Kinlyside, with fluctuations in numbers recorded each year since 2015. Kinlyside is the only site that showed a decrease from 2018 to 2019. Over the 2 years of GSM population monitoring at Throsby East, an increase in numbers was observed.</p> <p>All offset sites recorded a drop in GSM population and distribution in the 2020 and 2021 survey year, likely due to the La Nina climate patterns causing conditions unsuitable for the emergence of adult moths. This drop in numbers should not be used to infer a decline in a population, as a single year of survey data cannot untangle the effects of management and weather on the abundance of this species.</p> <p>Although formal surveys of GSM are not a core requirement at Taylor and Horse Park North, they were opportunistically conducted for the first time in October 2020. Small populations of GSM were confirmed in small areas of both offset areas. Further opportunistic surveys were undertaken in 2021, and a third year is intended in 2022 to contribute to baseline surveys.</p> <p>Comprehensive results are included in the Golden Sun Moth Monitoring and Mapping Reports published on the <a href="#">ACT Environmental Offsets Website</a>:</p> <ul style="list-style-type: none"> <li>• <a href="#">Environmental Offsets Ecological Monitoring Program Report 2018-19</a></li> <li>• <a href="#">Environmental Offsets Ecological Monitoring Program Report 2019-20</a></li> <li>• <a href="#">Throsby North GSM Population Monitoring and Habitat Mapping 2017</a></li> <li>• <a href="#">Kinlyside GSM Population Monitoring and Habitat Mapping 2017</a></li> <li>• <a href="#">Bonner, Throsby and Kinlyside - GSM Population Monitoring and Habitat Mapping 2016</a></li> <li>• <a href="#">Bonner, Throsby and Kinlyside - GSM Population and Habitat Monitoring Program Report 2015</a></li> <li>• <a href="#">Throsby East GSM Habitat Mapping 2017 (1.5 MB)</a></li> </ul>	<p>Ongoing.</p> <p>GSM population monitoring occurred in flying season in 2018-2019, 2019-2020 and 2020-2021 across all offset sites. A select set of sites were monitored in 2021-2022 as per the Monitoring Schedule.</p> <p>Future GSM population monitoring is scheduled to be undertaken in the flying season of 2023 and 2026. However, pending resourcing and availability, long-term monitoring sites (Kinlyside and Throsby North) may also be surveyed for GSM population between these years.</p> <p>GSM <i>habitat condition</i> monitoring for all offset sites was completed in 2018-2019, 2019-2020, 2020-2021 and 2021-2022.</p> <p>Future GSM <i>habitat condition</i> monitoring is scheduled to be undertaken in the flying season of 2023 and 2026. Incidental <i>habitat condition</i> monitoring will also be undertaken during annual herbage mass surveys of these sites.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
			<p><b>Striped Legless Lizard (SLL)</b></p> <p>SLL are monitored at grassland areas in Kenny Broadacre and Nadjung Mada and have been surveyed annually as part of the Offsets Monitoring Program. SLL <i>habitat condition</i> monitoring was undertaken at Kenny Broadacre and Nadjung Mada in 2018, 2019, 2020 and 2021 as part of annual herbage mass assessments. SLL population monitoring was also undertaken in these years.</p> <p>The population of SLL recorded at Kenny Broadacre appeared to decline from 2018 to 2019, with no individuals recorded in 2019. During this time there was reduced grass height due to drought. The abundance of SLL at each of these sites is low, particularly in comparison to other sites in the Gungahlin region that maintain large populations.</p> <p>A small increase has been recorded in the last 12 months (Spring 2021). After two consecutive wet years and an increase in biomass in conjunction with targeted management activities, the habitat for SLL at Nadjung Mada has improved. It was expected that SLL numbers would increase. This was confirmed during the 2021 season surveys with 4 individuals found across the site.</p> <p>Results are included in the Environmental Offsets Ecological Monitoring Program Reports published on the <a href="#">ACT Environmental Offsets Website</a>:</p> <ul style="list-style-type: none"> <li>• <a href="#">Environmental Offsets Ecological Monitoring Program Report 2018-19</a></li> <li>• <a href="#">Environmental Offsets Ecological Monitoring Program Report 2019-20</a></li> </ul> <p>A translocation plan has been produced and individuals from bordering development sites are being translocated into the reserve into a special enclosure as required.</p> <p>The Plan includes a commitment to achieve an outcome of the persistence of a viable population at Nadjung Mada, no net reduction in areas occupied by Striped Legless Lizard (<i>Delma impar</i>; SLL) in reserved populations and the improvement of 111 ha of SLL habitat.</p>	<p>Ongoing.</p> <p>SLL habitat condition and population monitoring occurred in 2018, 2019, 2020 and 2021.</p> <p>Monitoring to continue annually as part of the Offsets monitoring Program.</p>
			<p><b>Superb Parrot (SP)</b></p> <p>SP breeding was monitored at the Throsby East and Throsby North offset sites in the spring and summer of 2021.</p> <p>Sixteen (16) SP nesting attempts were located on the Throsby East offset site. In total, SPs raised approximately 13 young on the Throsby offset site in 2021. This is a dramatic decrease in breeding output compared to the pre-development baseline (2015) and subsequent monitoring years (2016 – 2020). The most likely driver of this very poor reproductive output relates to a significantly wetter La Nina season, which may have impacted the redistribution of nest competitors and predators in the landscape. For example, we observed the first predation of superb parrot young by gliders in 2021.</p> <p>Superb Parrot Monitoring Reports are published on the <a href="#">ACT Environmental Offsets Website</a>. <u>Further reports will be published in the future:</u></p> <ul style="list-style-type: none"> <li>• <a href="#">Breeding ecology of the Superb Parrot (Polytelis swainsonii) in northern Canberra: Nest monitoring report 2016</a></li> <li>• <a href="#">Breeding ecology of the Superb Parrot (Polytelis swainsonii) in northern Canberra: Nest monitoring report 2015</a></li> </ul> <p>Annual monitoring reports from 2017-2021 are in draft and expected to be published online on the <a href="#">ACT Environmental Offsets Register</a> in late 2022 or 2023.</p>	<p>Ongoing.</p> <p>Superb parrot monitoring completed:</p> <p>Sep 2015 – Feb 2016  Sep 2016 – Feb 2017  Sep 2017 – Feb 2018  Sep 2018 – Feb 2019  Sep 2019 – Feb 2020  Sep 2020 – Feb 2021  Sep 2021 – Feb 2022</p> <p>Superb parrot monitoring to continue in Spring 2022.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
			<p><b>Box Gum Woodland (BGW)</b></p> <p>BGW condition, including woodland structural attributes, floristics and understorey structure were monitored across the GSA offset sites (Horse Park North, Nadjung Mada, Kenny Broadacre, Kinlyside, Taylor, Throsby East and Throsby North) during 2018-2019, 2019-2020 and 2020-2021. 2020-2021 was the last year of baseline data collection. Floristics and understorey structure surveys were also undertaken in 2021-2022. Future results will be compared to the baseline to determine any ecological changes brought on by management actions or variability in climatic conditions.</p> <p>Preliminary results show that in 2018 and 2019, the native plant species richness on average fell below the benchmark of 35 and FVS was below benchmark of 37 for all sites. However, following favourable conditions in 2020 and 2021, areas of BGW in Kinlyside, Taylor, Throsby North and Horse Park North were recorded above benchmark FVS in 2021.</p> <p>In both 2018 and 2019, BGW mapped areas met the benchmark of above 50% native ground cover, except for Throsby East, which was 45% native ground cover in 2019. However, in 2020 and 2021 BGW areas fell below the benchmark of 50% native ground cover – most likely due to the wet seasonal conditions favouring exotic species, high grass biomass and low bare ground smothering out natives.</p> <p>All GSA offset sites were below benchmark for coarse woody debris, except for Kenny Broadacre, Throsby East and Taylor in 2019-20. All GSA offset sites except for Kenny Broadacre were also below the benchmark for the number of mature trees. Kenny Broadacre recorded the highest number of mature trees of all woodland offset sites and was well above benchmark. Woodland attribute surveys are committed to be undertaken again in 2024 across the GSA sites.</p> <p>Across all four survey periods, weeds were deemed to be a threat at all offset sites. However, the density of weeds has fluctuated with significant effort in the on-ground management response and seasonal conditions. The most recent results of BGW areas (spring 2021) recorded high density of Serrated Tussock at the Horse Park North, Kinlyside and Nadjung Mada nature reserves, Patterson’s Curse at the Kinlyside and Nadjung Mada nature reserves and Throsby North, and St. John’s Wort at Horse Park North, Kinlyside, and Taylor.</p> <p>In terms of woodland condition overall, preliminary results show that across the GSA sites, the best quality sites are Horse Park North, Kinlyside, Taylor and the northern section of Throsby North. Comprehensive results before 2018-19 and 2019-20 are published in the two Environmental Offsets Ecological Monitoring Program Reports available on the Offsets Website and Register.</p> <p>Box-Gum Woodland Monitoring and Mapping Reports are published on the <a href="#">ACT Environmental Offsets Register and Environmental Offsets Website</a>:</p> <ul style="list-style-type: none"> <li>• <a href="#">ACT Box-Gum Woodland Offset Monitoring 2016</a></li> <li>• <a href="#">Woodland Quality and Extent Mapping 2017</a></li> <li>• <a href="#">Grassland Quality and Extent Mapping 2017</a></li> </ul> <p><b>Pink-tailed Worm-lizard (PTWL)</b></p> <p>The PTWL is not a MNES with commitment targets in the Plan. Notwithstanding this, data is being collected on the habitat and presence of this species to inform land management planning and operations.</p> <p>The extent of potential low, moderate, and high quality PTWL habitat was mapped within Kinlyside in November 2016, with 25 ha of potential moderate and high quality PTWL habitat was described. Population monitoring will commence in 2023, following the newly developed low impact monitoring method (Milner in prep). Results of this study may be published on the EPSDD website.</p> <p>Further, mapping of any potential PTWL habitat will occur in Horse Park North and Taylor avoidance areas in 2022.</p>	<p>Ongoing.</p> <p>Floristic surveys and herbage mass analysis were undertaken in 2018-2019, 2019-2020, 2020-2021 and 2021-2022.</p> <p>Woodland structural attributes for BGW condition surveys were undertaken in 2018-2019, 2019-2020 and 2020-2021.</p> <p>Vegetation condition in the form of herbage mass and weed density surveys will continue annually across all GSA sites.</p> <p>BGW condition (structural attributes + floristics) is scheduled to be surveyed again in 2024, with floristics to be undertaken in other years (between 2022-2024) if resources permit.</p> <p>Ongoing.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
			<p><b>Woodland birds</b></p> <p>Woodland bird monitoring is not a core requirement of the GSA. However, woodland birds are monitored by PCS as part the woodland bird monitoring schedule at Horse Park North, Taylor, Throsby North, Throsby East and Nadjung Mada. Woodland bird monitoring is undertaken by the Canberra Ornithologist Group at Kinlyside using the same methodology. This monitoring is consistently undertaken seasonally, including in 2018, 2019, 2020, the Autumn of 2021 (Horse Park North, Kenny, and Taylor), and was completed in Winter of 2022 (Throsby North and Throsby East). Future surveys of woodland birds may be undertaken on a 3 or 5 yearly basis, pending resource availability.</p> <p>Preliminary results of these surveys indicate that Horse Park North and Taylor host the highest number of native bird species richness, with the sites recording over 52 and 39 native bird species respectively. The density of the native pest species, Noisy Miner, is considered to be above threshold at Nadjung Mada, Throsby East and Throsby North.</p>	<p>Ongoing.</p> <p>Woodland bird monitoring was completed in Winter of 2022. Future surveys may be undertaken on a 3-5 yearly basis, pending resources.</p>
15	<p>Any action that results in a breach of commitments of the Plan and adversely affects MNES values will be investigated and reported to DoE with identified recommendations for rectification, remediation or additional compensation.</p> <p>Remedial actions or additional compensation will be undertaken for controllable or avoidable actions which lead to a decline in MNES values with respect to the stated outcomes of the Plan.</p>	PIT	<p>In response to the Audit Report (commitment 19) and internal review (commitment 17), a new procedure to report potential breaches of the GSA was implemented. In 2019-20 the procedure was updated to reflect lessons learnt and to ensure practical outcomes. It sets responsibilities and timeframes for reporting, investigations and communication with relevant GSA stakeholders and the Commonwealth.</p> <p>As reported previously, monitoring in recent years (during the drought) at Kinlyside and Kenny / Nadjung Mada indicated potential long-term decline of some MNES, including BGW, GSM habitat and SLL, resulting in a potential breach of the Plan. In August 2020, the ACT Government reported this to the Commonwealth to advise the factors contributing to potential long-term decline and the Territory's management strategy to address this issue. The Commonwealth supported the Territory's proposed management strategy.</p>	<p>Ongoing.</p> <p>Breaches will be investigated and GSA stakeholders (DCCEEW, PIT, EPSDD) will be notified according to agreed timeframes.</p> <p>Monitoring of Kenny and Kinlyside will continue with ongoing site management and planning activities expected to help reduce further decline in MNES at these sites.</p>
16	<p>Prepare and submit Annual Reports (n=20). Highlighting the implementation of the actions and relevant conservation outcomes for MNES. All reports, in addition to any research related to the Plan will be published on the internet in a central location.</p>	PIT	<p>The 2020-21 Annual Report was submitted to the Commonwealth in August 2021.</p> <p>This report represents the 2021-22 Annual Report.</p> <p>All Annual Reports are published on the <a href="#">Environmental Offsets Register</a>:</p> <ul style="list-style-type: none"> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2020-21</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2019-20</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2018-19</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2017-18</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2016-17</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2015-16</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2014-15</a></li> <li>• <a href="#">Gungahlin Strategic Assessment Annual Report 2013-14</a></li> </ul>	<p>Ongoing.</p> <p>Annual reports are due within 2 months of the end of the financial year (31 August) each year until 2033.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
17	Prepare and submit Plan Review Report (n=5). The final Plan Review Report will include a summarised synthesis of all knowledge gained over the life of the Plan in order that it represent a complete description of actions taken under the Plan, requirements for ongoing management and opportunities for future enhancement beyond the life of the Plan.	PIT	Plan Review Reports are scheduled every fourth year from endorsement of the Plan (within 6 months of the end of financial year) until 30 August 2033.  The Plan Review Report was last prepared September 2018. The current (2022) Plan Review Report will be submitted along with this Annual report.	Ongoing.  The next Plan Review Report is due in August 2026.
18	Engage a third party (outside of the PIT membership or working group) to undertake an annual audit of financial management under the Plan. Findings of the audit are to be included in the annual report.	PIT	Financial audits are undertaken by EPSDD Strategic Finance who consult with PCS representatives. Findings of the 2021-22 audit are displayed in Table 3 below.	Ongoing.  These details are Included in Annual Reports, due 31 August each year until 2033.
19	Engage a third party to undertake an Independent Audit of the Plan's implementation (n=4).	PIT	The Independent Audit is a recurring commitment item due every five years. The Independent Audit of the GSA was last prepared by the Office of the Commissioner for Sustainability and the Environment in November 2017.  The next Independent Audit is due in June 2023.	Ongoing.  The next audit is due June 2023, thereafter every five years until 2033.
21	Creation of nature reserve in Kenny.	EPSDD - PCS	The Territory Plan Variation (Plan Variation <a href="#">379</a> ) to rezone the land and formally establish the Kenny Nature Reserve commenced during 2020-2021 and was approved by the Minister for Planning and Land Management on 2 August 2021	Gazettal in 2021.
22	Commence management of a nature reserve in Kenny (160 hectares). Created by the excision of rural Block 775 Gungahlin from future development potential.	EPSDD - PCS	As highlighted in commitments 4 and 15, the rural lease over the Kenny offset site was withdrawn in 2020-2021 and PCS commenced management from March 2021. The area was formally gazetted as Nature Reserve in 2021 and will be managed as a Nature Reserve in the ACT in perpetuity. This commitment is now complete.  Land management activities conducted during 2021-2022 included: <ul style="list-style-type: none"> <li>weed control on reserve and in neighbouring buffers focused on invasive grasses;</li> <li>Serrated Tussock and African Love Grass control, also included some broadleaf and thistle management;</li> <li>reviewing and implementing fire fuel management strategies such as slashing for access and fire breaks;</li> <li>soil contamination testing surrounding the stock yards; site heritage assessment; and</li> <li>increased reserve security measures (assessment of boundary fence condition and locks on gates).</li> </ul> Reserve naming signs have been arranged and will be installed in late 2022. Restoration and enhancement activities included mowing for biomass management to promote habitat heterogeneity, ecological burning proposed and partially implemented during 2021-22 (wet conditions hindered implementation), and a review of grazing. Preparation of a restoration plan commenced in 2021-22. 16 forb nodes have been established following the implementation of ecological burns. Temporary fences have been installed to protect these nodes.  A SLL translocation enclosure was completed ahead of the Spring 2021, pre-construction clearance	Land management from PCS commenced March 2021, and Nature Reserve was created in August 2021.

			<p>surveys for the neighbouring East Gungahlin High School development. A number of individuals were relocated to this enclosure within Nadjung Mada from road reserves in the construction site.</p> <p>A grazing management plan will be prepared during 2022-2023. Kangaroo population counts will also be undertaken across the landscape in 2022-2023.</p> <p>As outlined in commitment 9 above, an offset management plan for the Nadjung Mada Nature Reserve is currently being prepared and is expected to be submitted to the Commonwealth in 2022-2023.</p> <p>An Activities Declaration is being drafted, with upload to the legislative register in 2022-2023.</p>	
26	<p>Improvement in the under-storey diversity of 104 hectares of box gum woodlands that presently do not meet the definition of the listed community. Areas subject to this action will include those that are presently in nature reserves in addition to areas that will become nature reserve as a result of implementing the Plan.</p>	<p>EPSDD in consultation with the PIT - PCS</p>	<p>This is described in the relevant Habitat Improvement Plan (HIP) and is required to be completed within 20 years of endorsement of the Plan.</p> <p>Updated BGW mapping undertaken across GSA offset sites in 2017 continues to inform MNES improvement planning and baseline for future activities. A restoration zone map and spatial tool with site specific attributes has been delivered by the offsets planning and monitoring teams. These tools have assisted in informing targeted operational planning and implementation to maintain or improve BGW understorey towards meeting the EPBC Act definition of the listed endangered ecological community. This will help achieve restoration in BGW understorey diversity by more accurately reflecting the baseline from which habitat improvement and restoration plans can be established, implemented, and evaluated.</p> <p>Activities to improve understorey diversity in 2021-2022 included:</p> <ul style="list-style-type: none"> <li>• Maintenance of heavy-duty tree guards around individual naturally regenerating native eucalypt to protect from grazing pressure (guided by identified restoration zone map);</li> <li>• Managing macropod grazing pressure annually in line with the ACT herbage mass guidelines;</li> <li>• Past intensive monitoring and eradication of rabbits has resulted in no rabbits being detected in 21-22 in the Mulligans offset sites.</li> <li>• Implementation of a successful fox eradication program at the Mulligans sites, with a number of foxes removed over the last 12 months. Foxes have not been detected on camera since May 2022;</li> <li>• Biannual camera array monitoring for feral animal detection and kangaroo population counts at the North Gungahlin offset avoidance areas</li> <li>• Continuation of the invasive plant operational program, including the treatment of several weed species such as Serrated Tussock, African Love Grass, and St John's Wort, broadleaf weeds and thistles;</li> <li>• Slashing and spraying Phalaris at strategic locations to encourage eucalyptus, native grass, and forb regeneration;</li> <li>• Biomass management actions guided by the ACT herbage mass guidelines and spatial data sets, including implementation of ecological burns followed by seeding and plantings, strategic mowing and slashing to create habitat heterogeneity.</li> <li>• Preparation of Restoration Plans for Throsby sites and Nadjung Mada Nature. Strategies include further ecological burns when conditions are appropriate, native grass harvesting, and planting out of forb nodes.</li> </ul>	<p>Ongoing.</p> <p>Follow-up floristic vegetation monitoring of offset sites was undertaken again in spring 2021. Herbage mass and weed density monitoring will continue annually at all sites.</p> <p>Use of updated BGW mapping to inform improvement activities was undertaken in 2021-2022 and will continue into 2022-2023.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
28	<p>Fire hazard management strategies that include specific considerations for:</p> <ul style="list-style-type: none"> <li>• box gum woodland</li> <li>• golden sun moth</li> <li>• striped legless lizard</li> <li>• superb parrot</li> </ul>	EPSDD - PCS	<p>These are being developed for each reserve as ecological considerations are provided in the Strategic Bushfire Management Plan (ACT Gov).</p> <p>Specific bushfire management and mitigation measures are also outlined in the Regional Fire Management Plan which was revised in consideration of the impacts of the Orroral Valley Bushfire. The <a href="#">2019-2028 Regional Fire Management Plan</a> was finalised and released in November 2021. This included a review of the Fire Management Zones in the Taylor 3 approval development process, which is determined by ACT Emergency Services Agency.</p> <p>Annual bushfire work programs are outlined in the yearly-prepared Bushfire Operations Plans (BOPs) and these are published online along with the Regional Fire Management Plan and Fire Management Zones on <a href="#">ACTMapi</a>.</p> <p>Planned fire (hazard reduction and ecological burns) are reviewed by Conservation Research and the Districts to include the ecological guidelines for these values. The following link outlines the ACT <a href="#">Ecological guidelines for fire, fuel and access management operations (act.gov.au)</a>.</p>	<p>Ongoing.</p> <p>The Fire Management Strategy for Taylor 3 is the most recent submitted.</p>
31	<p>Commence planning for implementation of focused research on superb parrot habitat requirements:</p> <ul style="list-style-type: none"> <li>• Research focusing on nest site selection, nest site fidelity, fecundity, population dynamics and methods of reducing or eliminating nest hollow competition from aggressive native species or exotic pests such as common myna and European honeybee.</li> <li>• Assisted natural regeneration to facilitate future hollow formation will be undertaken in areas likely to be suitable as future nesting sites.</li> </ul> <p>Removal of stock leading to a reduction in localised compaction and concentration of nutrients, improving long term tree survival.</p>	EPSDD - PCS	<p>SP numbers, breeding behaviour, nesting attempts and productivity are monitored at Throsby East and central Molonglo Valley. Data have been analysed to compare nest survival and reproductive success across these two colonies. Results show that Superb Parrot nest success is consistently high, but the condition of young can vary significantly from year to year. This is an important field for further research. Our findings will be presented in a peer-reviewed paper (in review).</p> <p>High nesting success displayed by superb parrots suggests that nest competition from other hollow-using fauna is not a threat that requires management intervention at this time. Ground-based bird surveys have been undertaken at the breeding area since 2017, and results will be analysed to assess change in competitor abundances. Competitor abundances and SP nesting success should continue to be monitored annually at Throsby East.</p> <p>Detailed tree hollow data have been collected at Throsby East offset site and central Molonglo Valley, and analysed to characterise SP nest preferences, and assess local-scale nest hollow availability. Results indicate availability of suitable SP nest hollows is very low. Findings have been published in a peer-reviewed paper.</p> <p>Images from camera traps located at active superb parrot nests are collected and analysed through the online citizen science platform 'DigiVol', and this work is ongoing. Evidence of egg destruction by Starlings, and predation of chicks by Brown Goshawk and probably Kookaburra, were collected. We aim to present our results in a peer-reviewed paper (in prep).</p> <p>Species Distribution Models have been built for the superb parrot based on research outcomes (monitoring and tracking data) and these models will be used for strategic planning of habitat improvement, including assisted natural regeneration at future potential nesting sites, for the species. We aim to present our results in a peer-reviewed paper (in prep).</p> <p>Genetic analysis of the ACT SP population has been undertaken. Results show that SP are strictly monogamous, that the number of individuals contributing to the population is low, and recruitment of young into the breeding population is absent. This is an important field for further research. Our findings will be presented in a peer-reviewed paper (in review).</p> <p>Grazing stock is being managed to prevent compaction and concentration of nutrients under nesting trees.</p>	<p>Research completed; publications pending.</p> <p>2013-14: 20 June 2014 2014-15: Planning / Underway 2015-16: Research objectives met 2016-17: Research objectives met 2017-18: Research objectives met 2018-19: Research objectives met 2019-20: Research objectives met 2020-21: Research objectives met</p> <p>This research is complete, unless monitoring (see #14 above) reveals new information that warrants reopening of investigation.</p> <p>One scientific paper has been published (hollow selection). Two scientific papers are submitted and in review (nest success, genetic structure). Two scientific papers are in preparation (habitat distribution modelling, DigiVol analysis).</p> <p>An Offsets Research Evaluation Report and Operational Management Guide will be drafted by 2024.</p>

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
33	Undertake control programs of ruderal species.	EPSDD - PCS	<p>PCS previously engaged the services of the Canberra Indian Myna Action Group (CIMAG) in 2017 to assist with monitoring and management of Common Mynas on the edge of Throsby, where they occupy potential and known superb parrot breeding habitat. CIMAG is no longer engaged as the group had internal challenges to overcome, and their approach to Myna management was deemed problematic by PCS ecologists.</p> <p>High nesting success displayed by Superb Parrots suggests that nest competition from other hollow-using fauna (including Common Mynas and Common Starlings) is not a threat that requires management intervention at this time. However, it is possible, and arguably likely, that hollow competitor abundances will increase within GSA sites as avian communities establish in the neighbouring suburb. SP nesting success will continue to be monitored to determine whether ruderal species impose a significant threat to their reproductive output. Please refer to commitment item 31 for further details.</p> <p>Furthermore, additional plantings near suburban development to create more complex habitats for native bird species has occurred at some locations (Taylor and Horse Park North).</p>	Ongoing.
34	Undertake salvage and relocation of structural habitat elements such as rocks and logs.	Contractors	<p>Woody debris placement in BGW and tree snag relocation was completed in past years. Additional woody debris for Taylor was scheduled during the 2020-21 financial year, however the project was interrupted by rainfall, and this delay has continued. The project will continue pending suitable site conditions.</p> <p>Dam enhancement has been a focus for restoration partly due to retained soil moisture at some sites. Rocks and coarse woody debris have been placed in and at four dams to improve habitat, particularly for frogs. Additionally, some rock placement to address head cuts in erosion gullies, which also provides habitat, has occurred in Kinlyside this year. Other dam works, thinning and CWD have been impacted by saturated soils and COVID workplace interruptions.</p> <p>Woody debris is monitored in woodland plots and will be reported in the Environmental Offsets Monitoring Report which will be published on the <a href="#">ACT Offsets Register</a>. -</p>	Ongoing.
36	Undertake all bushfire management activities in line with ACT Government's Ecological Guidelines for Fuel and Fire Management Operations.	EPSDD - PCS	<p>Perimeter and fire trail slashing is undertaken on an annual basis as required. Herbage mass is also managed in some locations using grazing. Plantings are maintained as required. In 2021-22, additional slashing occurred in areas where the ground was dry enough to allow this occur. A hazard reduction burn was undertaken on the boundary of Nadjung Mada Nature Reserve, and ecological guidelines were applied. In the Mulligan offsets sites, Bushfire Operational Plan roadworks and repairs were completed in 2021. Slashing of roadsides and around assets occurred.</p>	Ongoing.
37	The formula for funding set out in Table 5.3 over the 20-year life of the Plan will be implemented.	PIT Strategic Finance PCS	<p>The formula for funding was implemented upon endorsement of the Plan and approval of the class of actions permitting urban development of Gungahlin.</p> <p>The formula for funding has been implemented where appropriate. It was identified in the plan that funding requirements may vary depending on the timing of land releases (connected to establishment of offset reserves), and on changing future costs of land management practices. These variations have occurred in some instances. Funding was given as a best estimate in 2013 and has been modified where necessary. Variations include:</p> <ul style="list-style-type: none"> <li>• Kinlyside offset requiring increased funding as compared to the plan due to ACT Government recognition of their responsibility to assist lease holders with land management and funding to deliver offset commitments.</li> <li>• Increased cost of delivering some land management activities.</li> <li>• Decreased costs of delivering land management activities or research projects where certain activities no longer need to be undertaken.</li> </ul>	Ongoing.

Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
38	Review the funding arrangements to ensure the Plan commitments are being met in the event of total expenditure variations of more than 5 per cent over the 20-year period (+/- \$1.325million).	PIT Strategic Finance PCS	<p>An annual variation (from normal spending) of more than 5% was recorded in the 2021-22 annual budget for funding of the GSA offset areas. The initial budget allocation for 2021-22 of \$933,250 was reduced to \$818,250 equating to a 12.3% variation.</p> <p>This variation occurred due to reductions and reallocations in funding across the EPSDD as a direct response to COVID-19 restrictions and budget impacts. This reduction resulted in some planned management actions being pulled back for this financial year, however all commitment-related offset management activities continued. Additionally, all staffing costs were maintained. Actions are being taken to:</p> <ul style="list-style-type: none"> <li>• Review the funding arrangements currently in place, and</li> <li>• Assess any impact of this reduction in line with meeting commitments of the Plan.</li> </ul> <p>Funding for the 2022-23 financial year has not been confirmed at the time of writing, and any variations will be reported in 2022-23 annual report.</p> <p>It is important to note that this was a reduction in ongoing budget allocations from approved ACT Government budgets, rather than a variation from the original estimates in the Plan. Variations from the Plan are discussed in Commitment 37, in the financial reporting section below, and Table 3.</p>	Ongoing.

## 8. Independent Audit

The Commissioner for Sustainability and the Environment completed the first independent audit of the GSA NES Plan in November 2017.

The audit found that the majority of the commitments, a total of 19 (five with observations), were compliant. A total of 13 commitments were not compliant, five of which were identified as high risk.

Areas of non-compliance resulted largely from delays in timely delivery and implementation of the commitments across government agencies. Five corrective actions were issued for high risk items to ensure commitments are met.

All of the corrective actions have been completed. EPSDD continues to work with relevant entities on improvements to the strategic assessment process and recording procedures as recommended by the independent audit and the Plan Review Report.

The next Independent Audit is due June 2023.

## 9. Plan Review Report

The Plan requires a Plan Review Report (the Report) to be prepared every four years from endorsement of the Plan. The Gungahlin Plan Review Report was completed in September 2018.

The 2018 Report provides findings on actions undertaken, improvements to MNES, legislation and policy changes, and knowledge gained from June 2013 to June 2018. The Report also considers issues and challenges that have arisen and opportunities for improvements to deliver the Plan.

The 2018 Report was the first Report over the 20-year timeframe of the GSA. There was limited information available to comment on all commitments when the first Report was prepared.

The second Plan Review Report for the period of June 2018 – June 2022, discusses the GSA progress over the past 4 years and recognises the delivery of commitments to date.

The Report concludes with a number of recommendations for improving the delivery of commitments in the future, and the ACT Government will continue to work with the Commonwealth Government to deliver these recommendations.

Some commitments are on-going and their progress will continue to be captured in the future Plan Review Reports.

The next Plan Review is due August 2026.

## 10. Financial Reporting 2021-22

The majority of offset-site related work during the 2021-22 financial year has been undertaken by the ACT Government employees as a direct allocation through four ACT Government budget initiatives:

- Enhancing the Protection of Endangered Species and Habitat (2015-16; project code 53804)
- Caring for our environment – Improving species and habitat protection (2016-17; project code 53786)
- Protecting grassland and conservation areas (2019-20; Capital investment only; project code 53956)
- Protecting Canberra's unique environment – Franklin Nature Reserve Enhancement (2021-22; project code 52318).

These initiatives have committed funding for the continued management of MNES in Throsby North, Throsby East, Kenny Broadacre, Kinlyside Nature Reserve and the Nadjung Mada Nature Reserve.

These initiatives also fund other offset sites in the ACT Government offset program, and funding is allocated between sites as appropriate.

The 2021-22 'Funding Environmental offsets' initiative built on a previous 6-month budget initiative, ('Delivering Environmental Offsets' (2020-21; project code 52275)), that was delivered mid-year in 2020-21 to provide interim support for offset delivery through the creation of two additional ranger positions and the extension of a third, established ranger position. The ongoing 2021-22 initiative (noted above) funded these positions permanently, building further capacity and certainty for offset delivery. These positions contribute heavily to GSA offset-site management and OMP implementation including the ongoing reserve establishment actions for Nadjung Mada Nature Reserve.

## 10.1 Funding expenditure and variations

**Table 3** below compares the funding expenditure estimated in the Plan to the actual spend amount in 2021-22. Some differences between these figures are due to changes in land management requirements or operational difficulties in achieving actions during COVID-19 lockdowns, and the significant increase in rainfall across the region due to a La Niña event. Importantly, increased rainfall in both the 2020-21 and 2021-22 financial years significantly impacted the ability of PCS to conduct certain management activities (particularly those requiring heavy machinery being on site), which altered spending patterns.

Funding amounts provided in Table 3 below include capital and recurrent expenditure over the 2021-22 financial year. In previous years, whilst capital expenditure was recorded by site, recurrent expenditure was not able to be recorded by site due to financial coding issues. During 2020-21, EPSDD and PCS commenced discussions to improve the tracking of recurrent expenditure by offset site. In particular, greater efforts were made to code invoices to specific sites (via cost centres), assign appropriate Natural Account codes (according to the accounting standards developed by the Australian Accounting Standards Board) and program codes to better identify and track expenditure across offset sites. These improvements are ongoing.

Despite these process improvements, it is noted that it takes significant time to review and confirm site-specific spending due to the complexities and requirements of the various financial recording, processing, and reporting applications used by ACT Government. Some discrepancies may remain between the Financial Reporting (see table 2) section (completed by PCS) and the Financial Audit (see table 3) section (completed by EPSDD Strategic Finance with input from PCS). For example, the audit may not include all capital spends. Improvement activities are ongoing and will continue into 2022-23 to address any discrepancies. However, due to whole of government processes and financial requirements outside the control of PCS and Strategic Finance, some discrepancies will likely remain, especially in terms of estimations of employee cost.

Funding for GSA activities in 2021-22 were originally estimated to be \$933,250 (capital and recurrent, non-employee expense). However, reductions and reallocations in funding across EPSDD in response to COVID-19 restrictions and budget impacts resulted in a final budget for 2021-22 of \$818,250. This equates to a 12.3% variation (reduction) in budget allocations for GSA offset sites. Staffing costs were maintained in the same period. Despite reductions in allocated funds for this financial year, and impacts from lockdowns and weather, base activities were maintained across the GSA.

It is important to note that this was a reduction in ongoing budget allocations from approved ACT Government budgets, rather than a variation from the original estimates in the Plan, which is outlined further in Table 3.

**Table 3 Comparison of estimated expenditure between the Plan and 2021-22 expenditure**

Offset Sites	Funding Secured (financial year)	Estimated expenditure in the Plan for 2021-22 (Table 5.3 of the Plan)	Estimated actual spend in 2021-22	Comments
<b>Direct Offsets</b>				
Mulligans/ Goorooyarroo offset sites (incorporating Kenny Broadacre, Throsby North and Throsby East)	2015-16	\$296,850.91	\$63,736.09	<p>These sites are in the “ongoing management” phase.</p> <p>In 2021-22, there were delays to contracts that saw reduced spending on this site. However, all obligations and management objectives were achieved.</p> <p>The original budget estimate also included costs to undertake works that are no longer required. This included large costs estimated for Throsby East to rehabilitate potentially contaminated land. Subsequent investigations determined that this was not needed.</p>
Kinlyside	2015-16	\$0	\$67,052.94	<p>This site is in the “ongoing management” phase.</p> <p>The original budget in the Plan assumed that land management costs for Kinlyside would be able to be met by the rural leaseholders. The ACT Government has recognised that additional funding and land management activities by PCS are required to aid rural leaseholders in maintaining the MNES values on the land to meet the Plan’s commitments. This includes activities required to deliver on the approved Habitat Improvement Plans, as well as other works to improve site condition (e.g., gully erosion abatement).</p> <p>This approach is consistent with the <a href="#">ACT Environmental Offsets Policy</a> and the <a href="#">ACT Environmental Offsets Policy Delivery Framework</a>.</p>

Offset Sites	Funding Secured (financial year)	Estimated expenditure in the Plan for 2021-22 (Table 5.3 of the Plan)	Estimated actual spend in 2021-22	Comments
Jacka, Taylor and Horse Park North	2016-17	\$110,300.40	\$183,326.50	<p>These sites are now in the “ongoing management” phase.</p> <p>In 2021-22, significant funds were invested in invasive plant control and in educational placemaking activities (to help residents of newly built adjacent suburbs to integrate with and understand these areas).</p>
Kenny (Nadjung Mada Nature Reserve)	2019-20 2020-21 (6 months interim funding only) 2021-22	\$610,828.80	\$127,326.42	<p>This site is in its “reserve establishment” phase. Noting that original estimates were made in 2013, this original estimated amount in the Plan did not reflect true costs. The original estimate also included a potential costly remediation of a spoil site (chemical sheep dip) that has since been assessed as unnecessary. As such, actual establishment and management costs for this site are significantly reduced compared to original estimates.</p> <p>This site received ongoing funding in the 2021-22 ACT Budget process to establish the reserve.</p>
Staff	2015-16 2016-17 2019-20 2021-22	\$451,246.18	\$ 870,381.36	<p>Estimated funding spent in the 2021-22 financial year on employee’s accounts for operational, planning and management staff required to enable effective management of avoided and offset areas. This may include, for example, administration, coordination, planning, research, and monitoring of the offsets program. The estimated expenditure from the GSA plan only included an estimated cost for on-ground staff.</p> <p>It should be noted that such staff deliver programs and actions across the ACT Government suit of offset sites and has as such been estimated as a percentage of work time.</p>

Offset Sites	Funding Secured (financial year)	Estimated expenditure in the Plan for 2021-22 (Table 5.3 of the Plan)	Estimated actual spend in 2021-22	Comments
<b>Indirect Offsets</b>				
Research	2015-16 2016-17	\$99,999.24	\$8,000	Research funding for 2021-22 has continued the superb parrot research projects. See commitment items for details. The ongoing nature of this project, as well as the inclusion of the research project into related superb parrot projects across the region, has seen significant opportunities for cost savings as well as the ability to meet actions in-house. Additionally, differences in amount spent and original estimates are due to no other research projects being active in this financial year and funds being spent only when necessary. Future research projects will be developed to meet relevant commitments as required.

## 10.2 Financial summary

**Table 4** below is a financial summary prepared by EPSDD Strategic Finance for expenditure spent in the Gungahlin Strategic Assessment offset areas for 2021-22.

**Table 4: Financial summary**

<b>Throsby</b>	
Consumables	13,636.36
Infrastructure	18,256.00
Weeds	5,063.73
Revegetation	24,530.00
Consultant, Contractors	2,250.00
<b>Total</b>	<b>63,736.09</b>

<b>Kinlyside</b>	
Weeds	16,951.82
Infrastructure	7,000.00
Tools, Equipment	1,935.55
Consultant, Contractors	32,272.72
Consumables	3,883.56
Lessee Payments	4,987.65
<b>Total</b>	<b>67,031.30</b>

<b>Jacka, Taylor, HPN</b>	
Restoration, Revegetation	32,905.50
Weeds	104,027.90
Consultant, Contractors	7,920.00
Consumables	13,045.62
<b>Total</b>	<b>157,899.02</b>

<b>Kenny</b>	
Consumables	900.90
Consultants, Contractors	2,964.55
Tools, Equipment	1,266.85
Weeding	24,131.31
Infrastructure	73,478.91
Restoration, Revegetation	21,827.50
<b>Total</b>	<b>124,570.02</b>

## 10.3 Projected 2022-23 Expenditure

Expenditure for 2022-23 will focus on continuing to deliver relevant management actions identified in the individual offset management plans for Kinlyside and the Throsby complex, delivering actions from the Nadjung Mada Nature Reserve offset management plan once it's approved, and all the actions associated with the establishment of Nadjung Mada Nature Reserve or with meeting commitments of the Plan.

Projected expenditure includes but is not limited to the following activities:

- Continue the major establishment phase of the Nadjung Mada Nature Reserve, including conducting major invasive plant reduction programs, and where appropriate, planning for tracks, trails, reserve borders, and restoration. Such activities will extend beyond 2022-23 (Commitments 21 and 22).
- Land management actions to be delivered in conjunction with leaseholders at Kinlyside (Commitments 9 and 23).
- Continued planning and work on targeted box gum woodlands restoration works (Commitment 26).
- Ongoing operational programs such as invasive weed and animal control across all offset sites (Commitments 24 and 25).
- Continue to deliver on the SP research project (Commitment 31).
- Continue to deliver the relevant sections of the offsets monitoring program (Commitment 14).
- Continue to deliver the SLL translocation program into Nadjung Mada Nature Reserve.

It is expected (based on current budget allocations) that spend on GSA sites in the 2022-23 financial year will be approximately \$293,100 in capital funding, and \$514,800 in recurrent, non-employee funding. Employee costs, based on previous years, are expected to total approximately \$1-1.5M.

Funding for the 22-23 financial year has not been officially confirmed at the time of writing, and any variations will be reported in 2022-23 annual report.

## 10.4 Future Funding

Due to the ongoing COVID-19 pandemic and associated economic impacts, the 2021-22 ACT Budget was delayed from the usual June release to October 2021. Similarly, the 2022-23 ACT Budget was not released until 2 August 2022<sup>1</sup>. The delayed release of budgets has flow on effects for the confirmation of Directorate and team budgets. As previous budgets were released in June greater certainty about future funding was able to be reported. Whilst the GSA funding includes a recurrent (expense) component in its budget allocation, aimed at providing on-going funding from year five (2017-18) and beyond, this component is a part of the ACT Government base funding and is subject to re-allocation, if necessary, as occurred in 2021-22. However, the 2021-22 budget process provided fresh initiative funding for the GSA for a four-year period, increasing funding certainty.

Currently, the GSA offset sites are funded by multiple separate budget initiatives, which also include funds to manage other PCS managed offset sites. The total amount of recurrent funds secured within these business cases is estimated at \$3.888M per annum, of which \$514,800 is expected to fund GSA offset sites in 2022-23. The total amount of capital funds secured within these business cases for 2022-23 is \$2.6M, of which, it is estimated that \$293,310 will fund activities in GSA sites.

While the current level of on-going recurrent funding is expected to continue to be provided to manage GSA sites, costs of undertaking on-ground management and restoration have generally increased and original estimates for restoration are likely to be underestimated. Further funding if required will be sought in future budget bids may be sought in the future if needed. With the combination of these funds, the ACT Government is committed to fulfil commitments of the Plan.

---

<sup>1</sup> Andrew Barr MLA, ACT Chief Minister and Treasurer. Chief Minister and Treasurer's Message. <https://www.budgetconsultation.act.gov.au/chief-minister-and-treasurers-message>

## 11. Areas of Non-Compliance

There were no non-compliance events reported during 2021-22.

As reported in previous Annual Reports, potential long-term decline of MNES has been monitored for several years in Kenny and Kinlyside, this continued during the 2021-22 reporting period.

Once established, any matters of non-compliance will be investigated and reported to DCCEEW as soon as possible.

## Appendix 1 – Completed Commitments

# Completed commitments

Environment, Planning and Sustainable Development Directorate  
ACT Government August 2022

## Completed commitments

Table 1 below describes completed commitments from the Plan.

Table 1 – Gungahlin Strategic Assessment Completed Commitments Item	Commitment	Responsibility (from 1 July 2018)	Comment	Timing and Date
2	Develop and submit to the Department of the Environment (DoE) for approval, the framework for investment in offsets, monitoring, reporting, adaptive management, compliance and enforcement. This will identify: <ul style="list-style-type: none"> <li>a) indicative monitoring program for:               <ul style="list-style-type: none"> <li>i. all MNES affected by the Plan;</li> <li>ii. newly created nature reserves;</li> <li>iii. Land Management Agreements for avoidance areas on NUZ3 – Hills Ridges and Buffers;</li> </ul> </li> <li>b) reporting requirements and frequency for:               <ul style="list-style-type: none"> <li>i. standard activities including monitoring, financial performance, measured outcomes;</li> <li>ii. reporting requirements for unanticipated or unapproved incidents.</li> </ul> </li> <li>c) process for review, improvement, approval and incorporation of new procedures within an adaptive management framework;</li> <li>d) compliance and enforcement procedures associated with design, construction and operation phase activities.</li> </ul>	PIT	The framework for investment in offset management was approved by DoE on 2 November 2014. (DoE reference SA/20)	Complete.
6	Establishment of the ‘Plan Implementation Team’ (PIT); and Submission of initial / indicative team membership and charter to DoE for approval.	Whole of ACT Government	Establishment of PIT within 3 months of Plan endorsement. Submission of Charter to DoE within 12 months of Plan endorsement.	Complete. PIT established on 17 January 2014. Charter submitted to DoE on 5 May 2014. Amended Charter was approved by DoE on 13 January 2017.
7	Establishment of a suitable mechanism to enable management of funds provided to the PIT for implementation of the Plan.	ACT Government	Funding to implement the actions as described in the Offset Management Plans was included in the 2016 ACT Government Budget.	Complete.
8	Develop and submit to DoE for approval a program of implementation of all of the commitments in the Plan.	PIT	The Program of Implementation was submitted on 11 May 2015.	Completed May 2015. The Program is reviewed and re-negotiated where necessary.
10	Develop amended Reserve Management Plans for existing reserves into which additional land is included as a result of the Plan in order to provide for adaptive management and condition improvement of the reserve in accordance with the objectives and commitments of the Plan.	EPSDD	The <a href="#">Mulligans Flat and Goorooyarroo Offset Management Plan</a> is completed and was published on the <a href="#">ACT Environmental Offsets Register</a> in May 2016.	Complete.
11	Develop and submit to DoE for approval, the framework for CEMPs for areas directly or indirectly affecting MNES. This shall include the monitoring, reporting and compliance requirements of: <ul style="list-style-type: none"> <li>• contractors undertaking physical works; and</li> </ul>	PIT	Within 3 months of establishment of the PIT.	Completed on 20 December 2013

	<ul style="list-style-type: none"> <li>• ACT Government officers or its representatives in auditing performance under the CEMP.</li> </ul>			
13	Collection of baseline ecological information for all new reserve areas.	PIT	<p>Initial baseline information was collated and used to inform the Habitat/Condition Improvement Plans and Offset Management Plans.</p> <p>Full baseline ecological data for all GSA areas has been collected in 2018, 2019 and 2020 monitoring seasons, for all relevant MNES (excluding Superb Parrots) and associated metrics. Baselines will be established from these three-year, consecutive datasets and will be used for revised plans.</p> <p>Baselines for data for Superb Parrot include:</p> <p>a) Number of nest trees – data recorded in 2015,  b) Abundance of competitors (post-Throsby development) for competitive pressure – data recorded in 2017, 2018 and 2019.</p> <p>Baseline data for all relevant MNES, including for Superb Parrots, will be published on the register in the ACT Environmental Offsets Register for each relevant offset area.</p>	<p>Complete.</p> <p>Superb Parrot baseline data collected 2015, and 2017-2019.</p> <p>All other MNES baseline data collected 2018-2020 (finalised in spring 2020).</p>
20	Creation of new nature reserves in Kinlyside, Gorooyarroo and Mulligans Flat.	EPSDD	This has been completed through Territory Plan Variation No. 2014-501, October 2014.	Completed October 2014 (TPV No. 2014-501).
23	Commence management of a nature reserve in Kinlyside (201 hectares) from the current extent of land in the RZ1 – Suburban zone under the Territory Plan in the location known as Kinlyside.	EPSDD	The nature reserve exceeds the stated 201 ha. The nature reserve is approximately 226 ha and the total area managed as an offset is 290 ha. The area is managed in accordance with the Kinlyside Offset Management Plan. This included negotiation of a services agreement with the existing leaseholder.	<p>Complete.</p> <p>Management commenced in July 2015.</p>
24	Commence management of additional 300 hectares to the Mulligan's Flat – Gorooyarroo nature reserve complex. Land to be excised from the future urban area of Throsby and the 'Kenny broad acre' area and managed for the protection of MNES.	EPSDD	Management of the extended Mulligans Flat and Gorooyarroo nature reserves commenced in July 2015. These areas are currently managed in accordance with the Canberra Nature Park Plan of Management 1999 (currently under review) and the Mulligans Flat and Gorooyarroo Reserves Offset Management Plan.	<p>Complete.</p> <p>Management commenced in July 2015.</p>
25	Commence management of additional 120 hectares to the north-western Hills, Ridges and Buffers zone from the urban areas of Taylor and Jacka in addition to the entire area of the north Horse Park broad acre area.	EPSDD	These sites have been under active PCS management since 2016-17 and will be the subject of ongoing management into the future.	<p>Complete.</p> <p>Management commenced 2016-17.</p>
27	<p>Habitat improvement plans for:</p> <ul style="list-style-type: none"> <li>• box gum woodland (approx. 104 hectares of habitat)</li> <li>• golden sun moth (up to 140 hectares of habitat)</li> <li>• striped legless lizard (up to 111 hectares of habitat)</li> <li>• superb parrot</li> </ul>	EPSDD	<p>All habitat improvement plans are completed.</p> <p>The Striped legless lizard (SLL) habitat improvement plan (HIP) is currently under review. This includes updating the scientific and grey literature, translocation plans and processes, and updates for site improvement for SLL.</p> <p>The revised SLL HIP will be submitted to the Commonwealth with the Kenny (Nadjung Mada) Offset</p>	<p>Completed and published on the ACT Environmental Offsets Register March 2015.</p> <ul style="list-style-type: none"> <li>• Box Gum Woodland and Derived Native Grassland Condition Improvement Plan 2015</li> <li>• Golden Sun Moth Habitat Improvement Plan 2015</li> </ul>

			Management Plan 6 months from the start of construction in the Kenny region. The final SLL HIP will be published on the register. Other HIPs may be revised at a later date if deemed necessary.	<ul style="list-style-type: none"> <li>• Striped Legless Lizard Habitat Improvement Plan 2015</li> <li>• Superb Parrot Habitat Improvement Plan 2015</li> </ul>
29	Protect known superb parrot nesting trees including exclusion fencing of the interface between Throsby East Reserve and the future urban area to limit pedestrian access points.	EPSDD	<p>The Throsby EDP was approved in April 2016 including exclusion fencing to ensure that development activity did not impact on superb parrot nesting trees. A concept plan for the extended Mulligans Flat Sanctuary considers access, interpretation, education and recreation opportunities that are consistent with managing the values of MNES.</p> <p>The 12km predator proof fence for the Throsby boundary was constructed in 2018 with final completion of the fence in January 2019. All known superb parrot nest trees are protected within the Throsby East reserve.</p> <p>The Goorooyarroo section of the predator proof fence was constructed in 2018 and completed in 2019. The extended sanctuary predator proof fence design takes into consideration of restricted pedestrian access points on the urban interface.</p> <p>Construction of the Mulligans Flat Ecotourism Centre started June 2019 and continues (Commonwealth Government funded).</p>	<p>Complete (exclusion fence and predator proof fence). Ongoing monitoring of superb parrot nesting trees will be reported at Commitment Item 14 in future annual reports. Monitoring for the superb parrot was completed in this area. Superb parrots were first detected at Throsby East in September 2017 following the commencement of bird surveys (monitoring) earlier that month. There was no indication that the predator proof fence construction impacted superb parrot breeding.</p>
30	<p>Establish educational resources including signage and guidelines for residents of east Throsby, including:</p> <ul style="list-style-type: none"> <li>• Description of ecological values and significance of the Mulligan’s Flat – Goorooyarroo nature reserve complex;</li> <li>• No domestic animals in reserves;</li> <li>• Management of pest species along the urban edge.</li> </ul>	EPSDD	<p>Interpretation signs have been installed along the extended predator proof fence with educational information on the natural and cultural history, and ecological values of the area. Educational signage is located on three walking paths through the offset areas. There are also signs that advise the public not to enter the areas during the Superb Parrot breeding seasons</p>	<p>Complete. Educational signage and guidelines along the fence were installed in 2018-19. Interpretation signs for educational purposes were installed along walking paths within the reserve in 2018-19.</p>
32	<p>Research golden sun moth habitat requirements:</p> <ul style="list-style-type: none"> <li>• may include research into translocation of golden sun moths</li> </ul> <p>fragmentation and proximity to urban areas</p>	EPSDD	<p>Addressed in the Habitat Improvement Plan for this MNES.</p> <p>A copy of the final report on research into Golden Sun Moth Translocation (Kinlyside Golden Sun Moth Translocation Monitoring 2018) based on research to date is published on the offsets register.</p> <p>Golden Sun Moth Monitoring and Mapping Reports are published on the Environmental Offsets Website:</p> <ul style="list-style-type: none"> <li>• Throsby North GSM Population Monitoring and Habitat Mapping 2017</li> <li>• Kinlyside GSM Population Monitoring and Habitat Mapping 2017</li> <li>• Bonner, Throsby and Kinlyside - GSM Population Monitoring and Habitat Mapping 2016</li> </ul>	<p>Complete</p>

			<ul style="list-style-type: none"> <li>• • Bonner, Throsby and Kinlyside - GSM Population and Habitat Monitoring Program Report 2015</li> <li>• • Throsby East GSM Habitat Mapping 2017</li> <li>• • GSM population and habitat monitoring report 2015</li> </ul>	
35	Undertake plantings to improve connectivity and wildlife movement along Gungaderra and Sullivan's creeks, targeting in particular superb parrot movement corridors.	EPSDD	Approximately 6000 plantings (tree, shrubs, and plants) were undertaken in 2017 to enhance connectivity and wildlife movement. Trees are growing well.	Complete. 6000 plantings were undertaken in 2017. These will be routinely monitored.