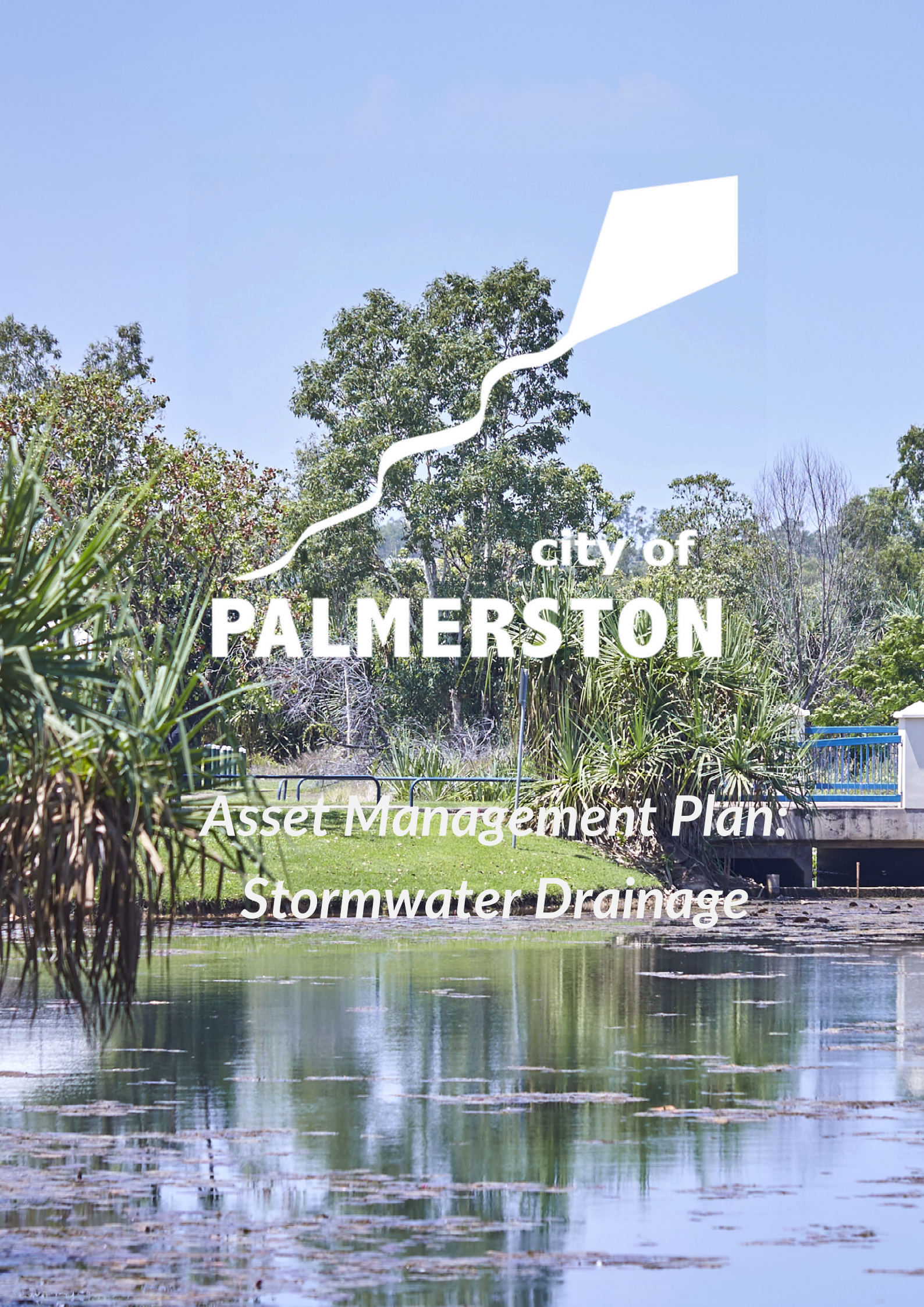



# Asset Management Plan: Stormwater Drainage

# 1. EXECUTIVE SUMMARY

## 1.1 The Purpose of the Plan

As the second largest and fastest growing city in the Northern Territory, the City of Palmerston has $727 million in assets under management which is expected to increase based on the Deloitte Access Economic (DAE) forecast (commissioned by the NT Government) for the five years (2018-2022) of 3.0% Economic Growth, 1.1% Population Growth and a Consumer Price Index (CPI) of 1.9%.

The purpose of this plan is to provide City of Palmerston with management guidance for the Stormwater Drainage asset class with a view to operating, maintaining and renewing the assets in the most cost-effective manner possible, whilst providing a specific levels of service.

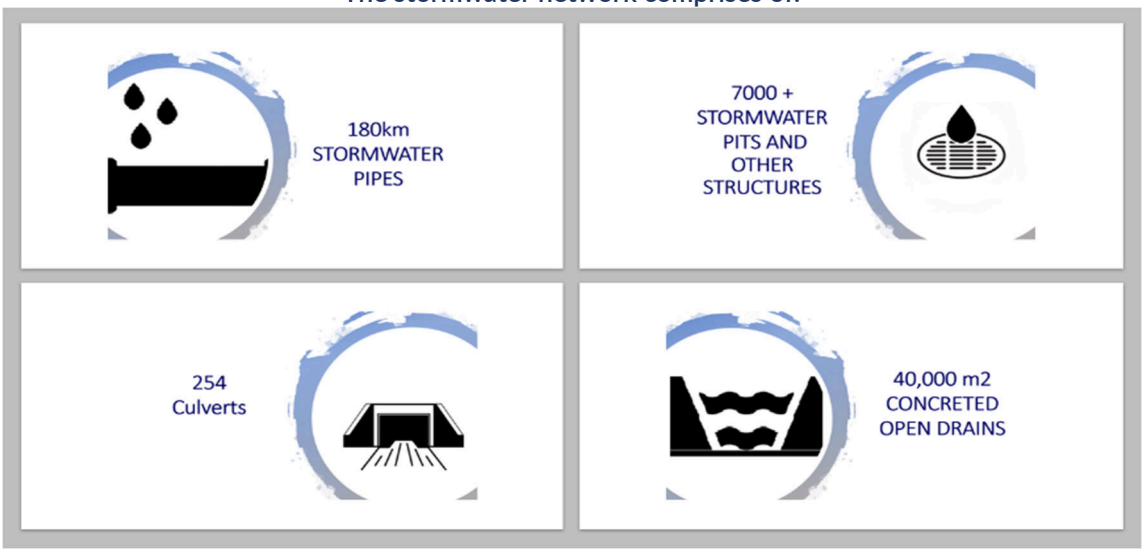
This Asset Management Plan aims to:

- Mitigate Council's Strategic Risk relating to long term sustainability;
- Ensure consistent asset management throughout Council Departments;
- Identify asset management issues and scenarios that may impact upon the Councils financial position;
- Detail information about infrastructure assets including actions required to provide an agreed level of service in the most cost-effective manner while outlining associated risks;
- Define the services to be provided, how the services are provided and what funds are required to provide the services over a 10-year planning period;
- Ensure infrastructure is safe for use, and the community receive value for money for their investment in community assets;
- Provide detailed asset data and data analysis to enable the Long Term Financial Plan to continue to be refined and improved.

## 1.2 Asset Description

This Asset Management Plan covers stormwater infrastructure across the City of Palmerston. Often overshadowed by other asset classes due to its mostly hidden nature and long useful life, stormwater assets dominate Council's asset portfolio, both in terms of financial value, and the number of assets that are in this class. The stormwater network provides critical service to the City of Palmerston and for all members of our community and ensures that other major asset classes such as roads and pathways are functional in wet weather.

The stormwater network comprises of:



## 1.3 Levels of Service

It is an objective of the City of Palmerston Community Plan that our infrastructure is fit for purpose. This requires that our infrastructure is maintained and managed to meet community needs. Service levels required to achieve sustainably maintained and managed, safe and fit for purpose stormwater drainage network means the City of Palmerston needs to:

- Mitigate inundation of private property and minimise localised flooding or roadways within the municipality.
- Manage the potential risks and conditions of assets to provide a safe environment.
- Deliver, maintain and manage infrastructure to current or higher standards to meet community needs.

## 1.4 Future Demand

The main sources of demand for new services are created by:

- New subdivisional activity, development of existing land and planning strategies (changes in CBD land use and population density),
- Community expectations on safety and service levels,
- Increase in environmental awareness and considerations,
- Increase demand for sustainable water resources.

These will be addressed through a combination of maintaining and upgrading existing assets and providing new assets to meet demand. Demand management practices include non-asset solutions, insuring against risks and managing failures.

Demand management plans include:

- Continue to monitor and provide input into development controls and guidelines for the requirements of effective stormwater management,
- Monitor, assess and implement measures to meet increased demand for environmentally sustainable stormwater management,
- Monitoring community feedback, trends and assess expectations against existing levels of service and available resources with consideration to budget.

## 1.5 Managing Risk

The present funding levels are adequate to control risk relating to these assets and the present inspection methodology complements this approach.

The anticipated development of programs that upgrade existing paths in advance of their planned replacement to meet contemporary standards and the construction of new paths to provide connectivity will require increased funding.

The management of risk can be facilitated by:

- Improving condition data of existing infrastructure to develop renewal and upgrade programs,
- Evaluating the network to remove duplicate asset data where applicable,
- Identify efficiencies in using available funding, and
- Taking opportunities to progressively increase funding levels over a period of 5 to 10 years with a view to establishing adequate cash backed reserves to meet future requirements.

## 1.6 Financial Summary

| | |
|---|---|
| Gross Replacement Cost | ***$261,001,891*** |
| Depreciable Amount | ***$261,001,891*** |
| Depreciated Replacement Cost[1] | ***$205,086,926*** |
| Annual Average Asset Consumption | ***$2,610,031*** |

The current combined allocation for Operating and Maintenance activities is $295,000 per annum.

With an average remaining useful life of 62 years (as at June 2020), the timescale to address the replacing the assets is well beyond the planning projections of any local government. To meet the current replacement value of the assets at current dollars would require Council to set aside an average of $3.67million per annum (approx. 17% of Rates revenue) for the next 62 years.

Annual direct asset maintenance expenditure is $245,000 plus other costs associated with open drains.

The Long Term Financial Plan includes $1,762,500 for the construction of concrete inverts within open drains, and safety related maintenance and improvements associated with safety (e.g. secure pits and inlet structures).

This Plan identifies the need to commence long term financial planning for future replacement together with continuing to allocate adequate Operating and Maintenance funds to retain the assets at an appropriate standard to ensure the effective service life of the asset is realised, if not exceeded.

## 1.7 Monitoring and Improvement Program

The next steps resulting from this asset management plan to improve asset management practices are:

- Continue to develop and refine levels of service with clearly accepted levels identified in the organisation and monitor these against community expectation.
- Provide greater detail for 10-year capital works budget in terms of proposed projects; i.e. specify which stormwater structures will require upgrade works etc.
- Risk criteria may be brought into line with Council's Strategic Risk Management Policy.
- Future budget level decisions (operations, maintenance, renewal and upgrade/new) should be driven by condition assessment data and resulting forecasted remaining useful lives balanced with customer expectations / levels of service.
- A formal methodology and program for monitoring the condition of the stormwater drainage network is to be developed.
- Develop a Capacity/Utilisation rating system to recognise changes in rainfall patterns with potentially higher intensity short duration events.
- Increase data confidence through condition assessment and consistent and effective record management to ensure asset data is current.
- Review maintenance response times outlined in the guideline document "Risk Based Infrastructure Inspection Manual".
- Review of asset data related to values and depreciation rates, including further data cleanse of Assetic database.

[1] Also reported as Written Down Value, Carrying or Net Book Value.