



Shire of Lake Grace

non-potable strategic community
water supplies plan

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For more information about this plan, contact Rural Water Planning, 1800 780 300.

Cover photograph: Dingo Rock Dam and Weir drone photo, Shire of Lake Grace.

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Summary

Water supply planning is essential in rural areas and requires collaboration, involvement and participation from all stakeholders, including farmland communities, local government authorities (LGAs) and State Government agencies as part of an integrated approach to sustainable water supply for the future.

This plan provides information for the Shire and farmers on the location of strategic community water supplies. It advises how to access non-potable water for emergency stock watering and firefighting purposes, including the facilities available at each site.

Introduction

Over the past 40 years, recurrent water supply problems have affected the dryland agricultural region. Emerging climate changes are likely to increase the occurrences of low rainfall years, resulting in water shortages and restrictions in rural communities.

As farmers face long-term water security challenges, they are encouraged to proactively develop and maintain on-farm water infrastructure to better prepare for dry periods.

Rural water planning recognises the importance of preparing for these events to increase the opportunities for delivering an assured water supply to farmland communities in the dryland agricultural areas of Western Australia (WA).

Strategic community water supply (SCWS) planning is one of the key roles of the Department of Water and Environmental Regulation's rural water program. The aim is to safeguard dryland agricultural areas wherever possible against serious water deficiencies.

While landholder self-sufficiency must remain the primary objective, the rural water program recognises the importance of emergency off-farm water supplies to farming communities. It also builds on the SCWS network across the dryland agricultural area through the Community Water Supplies Partnership (CWSP) program and the Agricultural Areas (AA) dam works program.

Both programs establish and improve non-potable water supplies to ensure that water is available for emergency livestock watering, firefighting and other farm needs. The CWSP program aims to reduce reliance on potable scheme water supplies for non-potable needs, and to increase water availability for public amenities such as sportsgrounds.

This plan has been compiled for the Shire of Lake Grace to provide a clear description of each of the SCWS in the shire available for firefighting purposes, and to farmers and farming communities in times of emergency.

Strategic community water supplies and agricultural area dams

A network of SCWS has been developed across WA's dryland agricultural areas to provide an important source of non-potable water for farming and firefighting needs.

These supplies are for emergency use in times when low rainfall causes on-farm supplies to become depleted and farmers need to travel to access water for livestock and essential farming purposes.

Vesting of the strategic dams and bores in each LGA varies, with some sites owned by government agencies (including the department), Water Corporation, the LGA itself, or by private entities where an agreement has been made to allow access.

It is important that these water supplies are carefully managed to ensure water is available during times of emergency.

The department keeps in regular contact with rural communities to monitor the condition of SCWS and identify and address any maintenance issues.

Each year, the department's rural water program manages work to maintain and upgrade sites vested with it, and sites in priority areas vulnerable to dry conditions.

AA dams have been developed since the early 1990s to provide water and support the growth of farming in the dryland agricultural area. There are about 480 of the original 681 AA dams that range from high value to no value in terms of their condition and serviceability.

SCWS is a subset of the AA dams that are reliable, in good to excellent repair and retain a high value. The department uses LGA maps to determine which sites are worth upgrading and to identify priority areas to develop new SCWS.

The following map (Figure 1) shows the location of the strategic community supplies and AA dams in the Shire of Lake Grace, with symbols indicating the capacity, vesting and values of each site.

Shire of Lake Grace map

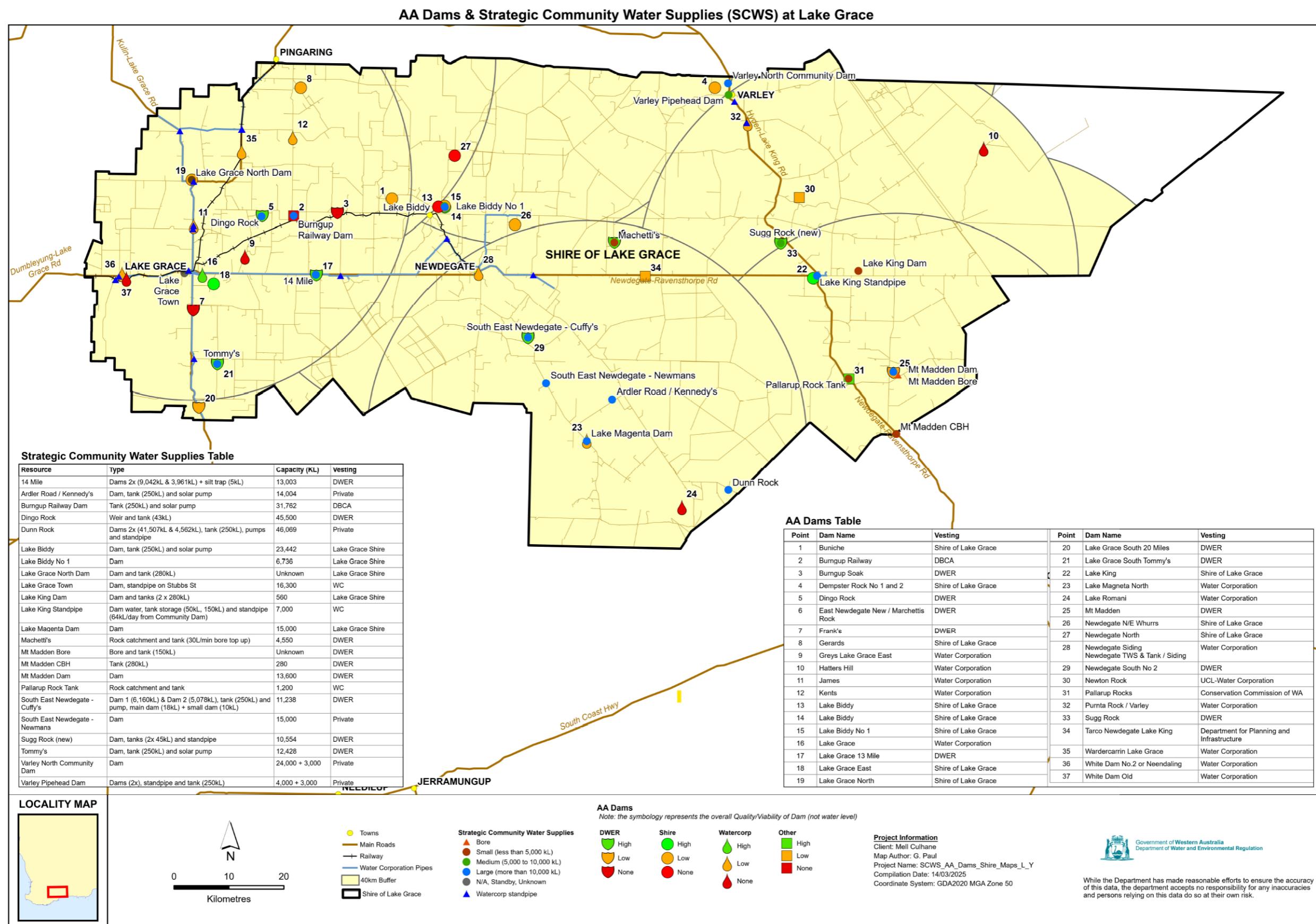


Figure 1 - Location of strategic community water supplies (at 14 March 2025)

Strategic community water supply access

Overview of different fill points

Each SCWS will have a fill point to allow access to water supply for agricultural purposes. Each fill point will have a camlock fitting. Standard sizes of camlocks include 50 mm (2 inch), 80 mm (3 inch) fitting and in some cases a 100 mm (4 inch) connection is fitted for firefighting purposes. These camlock fittings will be available where there is a tank, standpipe, swipe card system or bore fill point. When accessing water directly from dams without tank storage, you will need to bring your own pump to extract water.

Swipe card systems

Swipe card systems are metered fill points that require a swipe card or fob from your LGA to access the water supply. Contact your local LGA office to obtain a swipe card to access these water supplies.

During emergencies such as bushfires the Shire can switch the swipe card system to allow access without a swipe card. All local fire appliances have swipe card access. The emergency access contact is the Manager Infrastructure Services on 0448 089 092 / (08) 9890 2500.

Farm bots

Some tanks are fitted with farm bots, which regularly record the water level and feed this information into a website. You can access this website at app.farmbot.com.au (Login ID: **public.access** Password: **access1**) to view water tank levels for tanks fitted with farm bots.

Below are examples of different fill points you may come across in the shire.



Tank standard camlock fitting



Swipe card standpipe system



Tank, electric swipe card and pump for bore



Farm bot positioned on top of tank

Shire of Lake Grace SCWS sites

| Site name | Location |
|--|---|
| 14 Mile dam | Lake Grace – Newdegate Road <i>~750 m west of 14 Mile Road</i> |
| Ardler Road/Kennedy's dam | Ardler Road <i>~2.3 km south of Old Ravensthorpe Road</i> |
| Lake King standpipe | Newdegate – Ravensthorpe Road <i>junction of Lake-King Norseman Road</i> |
| Burngup Railway dam | Burngup Road North <i>~900 m from Biddy Camm Road</i> |
| Dingo Rock | Dam - West of Duckworth Road; Tanks - Biddy Camm Road between Duckworth Road & Beenong North roads |
| Dunn Rock | Taylor Road <i>~1 km west of Dunn Rock CBH</i> |
| Lake Biddy Twin Dams / Lake Biddy No.1 | ~1.4 km along Witham Road (off Biddy Camm Road), turn east on dirt road for ~1.4 km to Lake Biddy dam |
| Lake Grace town | Stubbs Street <i>~400 m from Griffin Street.</i> |
| Marchetti's tank | Haigh Road <i>~5.2 km from Newdegate – Ravensthorpe Road</i> |
| Mt Madden bore | Hatter Hill Road or Muncaster Road |
| Mt Madden dam | Hatter Hill Road or Muncaster Road access |
| Mt Madden CBH tank | Cnr Newdegate – Ravensthorpe Road & Fitzgerald Road |
| Pallarup Rock tank | Newdegate – Ravensthorpe Road <i>~1.2km from Old Newdegate Road</i> |

| | |
|---------------------------------|---|
| South-East Newdegate – Cuffy's | Parsons Road <i>~700 m from Magenta Road</i> |
| South-East Newdegate – Newman's | Magenta Road <i>~4.5 km south of Grant Road</i> |
| Sugg Rock | Sugg Rock Road off Hyden-Lake King Road |
| Tommy's dam | Tommy's Dam Road off Mallee Hill Road |
| Varley North community dam | Hyden-Lake King Road <i>~2.2 km from Varley South Road</i> |
| Varley Pipehead dams | Corner of Hyden-Lake King Road & Varley South Road |
| Lake Magenta dam | Magenta Road <i>~3.44 km north of Giles Road</i> |
| Lake Grace North dam | Kulin – Lake Grace Road <i>~550m west of Eggers Road</i> |

Description of community water supplies

14 Mile dam



Aerial of 14 Mile dam pre-works.



Location map



14 Mile main dam (Dec 2021)



14 Mile silt trap dam (Dec 2021)



Gauges at 14 Mile main dam (Dec 2021)



14 Mile catchment (Dec 2021)

14 Mile dam site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 17648 |
| Catchment type | Earth |
| Catchment area (ha) | 7.21 ha |

Location and coordinates

Location: Lake Grace–Newdegate Road ~750 m west of 14 Mile Road

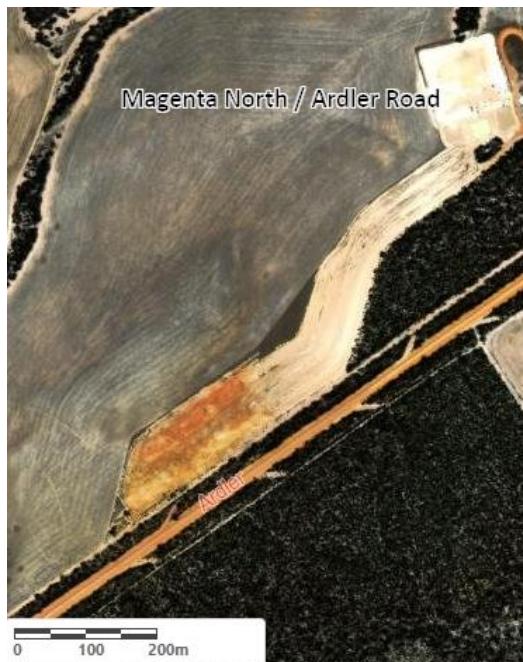
| | |
|-----------|----------------|
| Latitude | -33.103155203 |
| Longitude | 118.710478167 |
| Eastings | 659609.187267 |
| Northings | 6335975.763750 |

Water supply and access

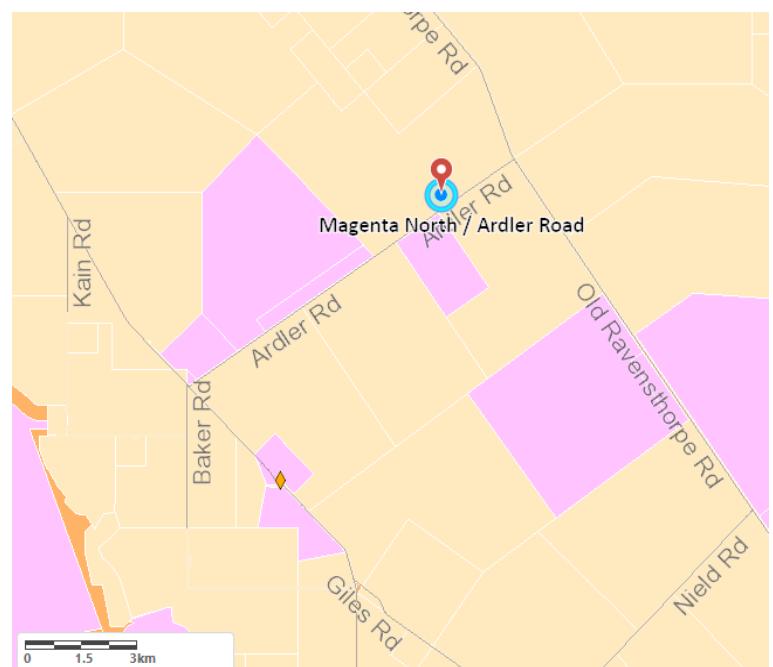
| | |
|---------------------------|--|
| Structure type | 2 x dams |
| Capacity | Dams 9,042kL, silt trap dam 3,961kL |
| Tank storage | No |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes, tight turn around |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Ardler Road/Kennedy's dam



Aerial view of Ardler Road



Location map



Ardler Road Dam



Dam gauge makers



Silt dam



250 kL tank



4" (100 mm) and 2" (50 mm) outlets



Ardler Road/Kennedy's dam site description

| | |
|---------------------|--|
| Vesting | Private |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private land |
| Catchment type | Earth |
| Catchment area (ha) | 5 ha |

Location and coordinates

Location: Ardler Road ~2.3 km south of Old Ravensthorpe Road

| | |
|-----------|----------------|
| Latitude | -33.298574178 |
| Longitude | 119.292261016 |
| Eastings | 713432.122782 |
| Northings | 6313267.610540 |

Water supply and access

| | |
|---------------------------|--|
| Structure type | Dam and tank |
| Capacity | Dam 1: 14,004kL, silt dam 2: 791kL |
| Tank storage | 250kL |
| Camlock coupling sizes | 3" (75 mm) and 2" (50 mm) |
| Standpipe Y/N | No |
| Farm bot Y/N | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

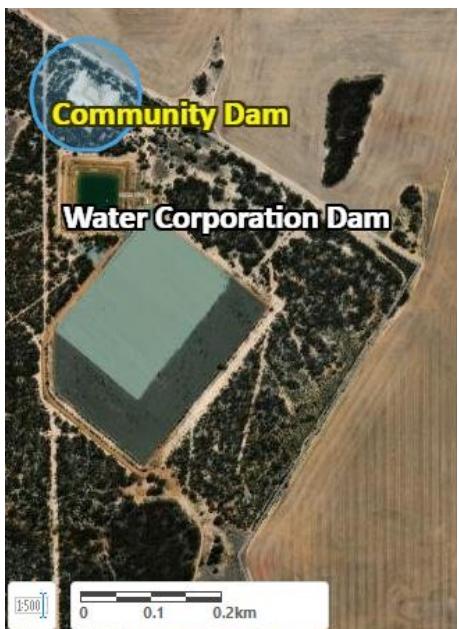
Lake King standpipe



Aerial view of Lake King standpipe



Location map



Aerial view of dams



Aerial view of tank locations



Tanks



Community dam

Lake King standpipe site description

| | |
|---------------------|--|
| Vesting | Dam – Water Corporation, Standpipe – Shire of Lake Grace |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 21238 |
| Catchment type | Bitumen |
| Catchment area (ha) | ~ 6.6 ha |

Location and coordinates

Location: Newdegate–Ravensthorpe Road, junction of Lake-King Norseman Road

| | |
|-----------|----------------|
| Latitude | -33.0879 |
| Longitude | 119.6862 |
| Eastings | 750721.881858 |
| Northings | 6335758.391860 |

Water supply and access

| | |
|----------------------|---|
| Structure type | Dam, tanks and standpipe (piped from Lake King community dam) |
| Capacity | 64kL/day from community dam |
| Tank storage | 250kL and two poly tanks |
| Standpipe Y/N | Yes |
| Swipe card system | Yes |
| Farm bot Y/N | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |

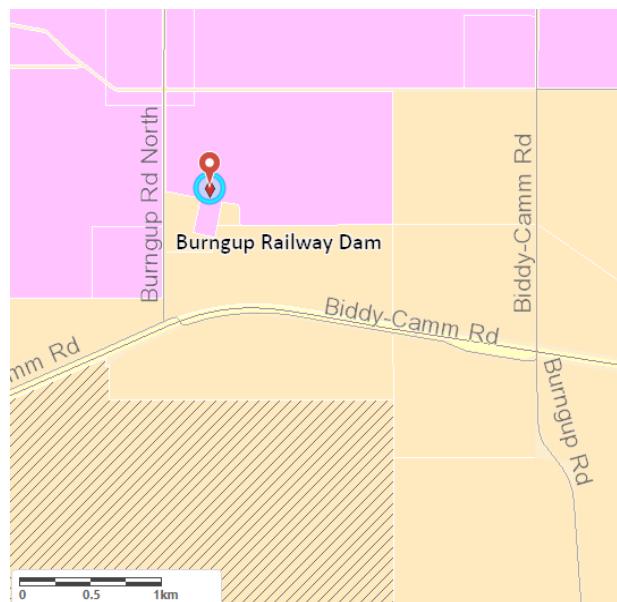
| | |
|---------------------------|---|
| Supply comments | Tanks are filled from Lake King community dam. The community dam is filled from the overflow provided by Water Corporation dam when supply allows. Tanks are located next to the tractor museum at the Varley–Ravensthorpe crossroads. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Burngup Railway dam



Aerial of Burngup Railway dam



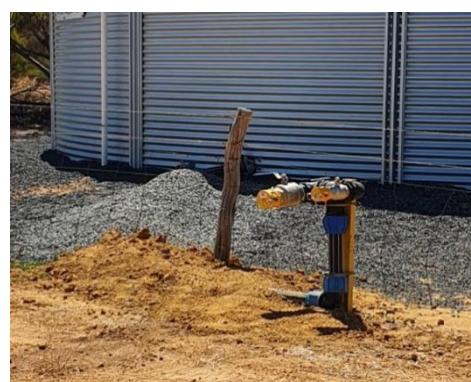
Location map



Dam (Aug 2021)



Tank corner Biddy Camm & Burngup North roads



Fill point

Burngup Railway dam site description

| | |
|---------------------|--|
| Vesting | Dam – DBCA, tank private |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 31111 |
| AA Dam # | 5004 |
| Catchment type | Earth |
| Catchment area (ha) | 1.35 ha |

Location and coordinates

Location: Dam - Burngup Road North ~900 m from Biddy Camm Road

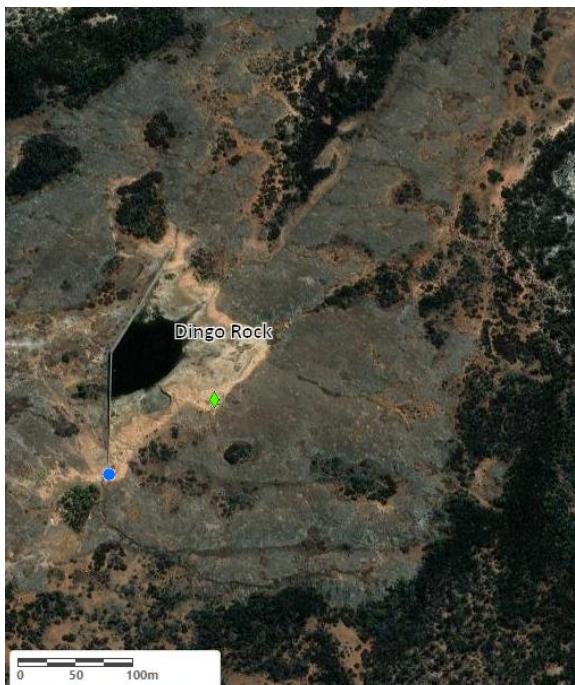
| | |
|-----------|------------|
| Latitude | -33.0074 |
| Longitude | 118.6653 |
| Eastings | 655563.90 |
| Northings | 6346660.37 |

Water supply and access

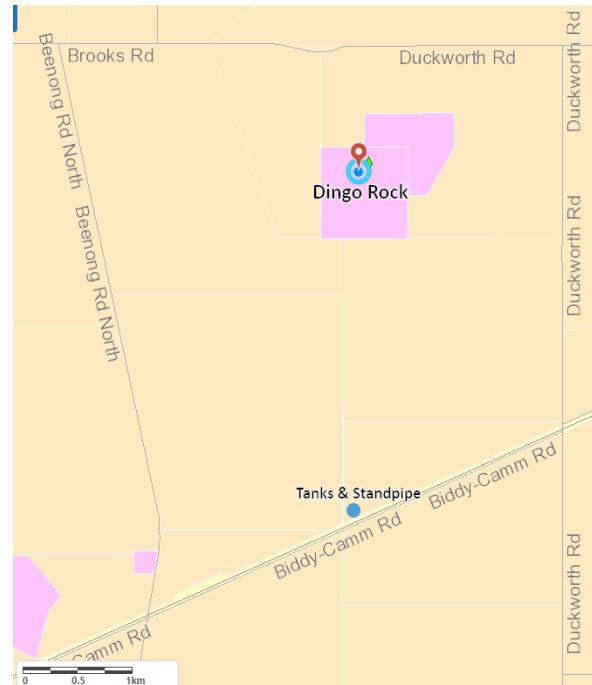
| | |
|---------------------------|--|
| Structure type | Dam, tank & solar pump |
| Dam capacity | 31,762kL |
| Tank storage | 275kL |
| Camlock coupling sizes | 50 mm and 80 mm |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes, on road verge |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Dingo Rock



Aerial view of Dingo Rock



Locality map



Fill point at Biddy Camm Road



Dingo Rock drone image



Dingo Rock and weir



Gauge



Dam weir wall



Plaque at Dingo Rock dam



Poly tank and standpipe



90 kL steel tank



Standpipe signage and coupling

Dingo Rock site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated Reserve | 18911 |
| AA Dam # | 560 |
| Catchment type | Rock |
| Catchment area (ha) | 80 ha |

Location and coordinates

Location: Dam - west of Duckworth Road; Tanks - Biddy Camm Road between Duckworth Road & Beenong North roads

| | |
|-----------|----------------|
| Latitude | -33.009777 |
| Longitude | 118.602914 |
| Eastings | 649729.031860 |
| Northings | 6346487.993110 |

Water supply and access

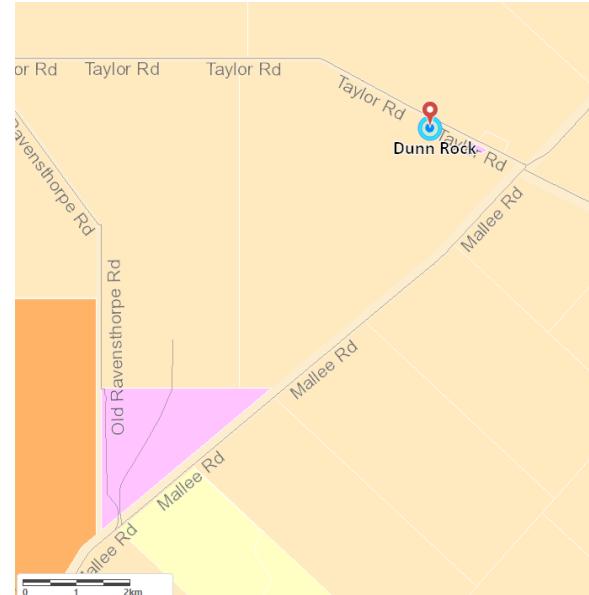
| | |
|---------------------------|---|
| Structure type | Concrete weir on rock, tanks on Biddy Camm Road |
| Tank capacity | 75kL poly tank, 90kL steel tank |
| Camlock coupling sizes | 50 mm and 80 mm |
| Standpipe Y/N | Yes, at poly tank on Biddy Camm Road |
| Pump available Y/N | No |
| Heavy vehicle access | Yes, at tanks |
| Turnaround area | Yes, at tanks |
| Supply comments | Water is gravity fed from Dingo Rock dam to tanks located on Biddy Camm Road. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Dunn Rock dam



Aerial view of Dunn Rock



Locality map



Dunn Rock main dam (Dec 2021)



Dam 2 Leo dam (Dec 2021)



Dunn Rock tank



Two coupling locations from tank on either side of access road.



Coupling outlet near tank

Dunn Rock dam site description

| | |
|---------------------|--|
| Vesting | Private |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private land |
| Catchment type | CBH hardstand, Taylor Road & farmland |
| Catchment area (ha) | 1 ha CBH roof, 5 ha hardstand, 1 km road, 1.30 ha farmland |

Location and coordinates

Tank location: Taylor Road ~1 km west of Dunn Rock CBH

| | |
|-----------|----------------|
| Latitude | -33.441850562 |
| Longitude | 119.523535339 |
| Eastings | 734586.138130 |
| Northings | 6296879.644630 |

Water supply and access

| | |
|---------------------------|---|
| Structure type | Round earth/Turkey nest dam |
| Dam capacity | (Main/Turkey Nest) Dam 1, 41507kL |
| Tank storage | Yes, 250kL at Turkey Nest Dam |
| Camlock coupling sizes | 50 mm, 80 mm & 100 mm |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Supply comments | Water from dam 2 is pumped to Turkey Nest Dam (Dam 1) and tank. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Lake Biddy twin dams/Lake Biddy No.1



Drone photo of Lake Biddy dams (Aug 2021)



Lake Biddy (A)



Lake Biddy No. 1 (B)

Lake Biddy twin dams site description

| | |
|---------------------|--|
| Vesting | Lake Grace Shire |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 23140 |
| AA Dam # | 561 |
| Catchment type | Earth |
| Catchment area (ha) | 17.52 ha |

Location and coordinates

Location: ~1.4 km along Witham Road (off Biddy Camm Road), turn east on dirt road for ~1.4 km to Lake Biddy dam.

| | |
|-----------|---------------|
| Latitude | -32.9896 |
| Longitude | 118.9586 |
| Eastings | 683005.37743 |
| Northings | 6348164.48493 |

Water supply and access

| | |
|------------------------------|--|
| Structure type | 2 x dams |
| Lake Biddy Dam (A) capacity | 23 442kL |
| Lake Biddy No.1 (B) capacity | 6,737kL |
| Tank storage | 250kL |
| Camlock coupling sizes | 50 mm & 80 mm |
| Standpipe & pump Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Lake Grace town

Please note this site is only to be used with Water Corporation permission.



Aerial view of Lake Grace town



Aerial view of standpipe and tank



Location map



Non-potable signage



Tank and standpipe

Lake Grace town site description

| | |
|---------------------|--|
| Vesting | Water Corporation, Shire of Lake Grace agreement |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private |
| Catchment type | Bitumen |
| Catchment area (ha) | ~ 25 ha |

Location and coordinates

Location: Stubbs Street ~400 m from Griffin Street.

| | |
|-----------|----------------|
| Latitude | -33.1040 |
| Longitude | 118.4543 |
| Eastings | 635700.962919 |
| Northings | 6336242.788360 |

Water supply and access

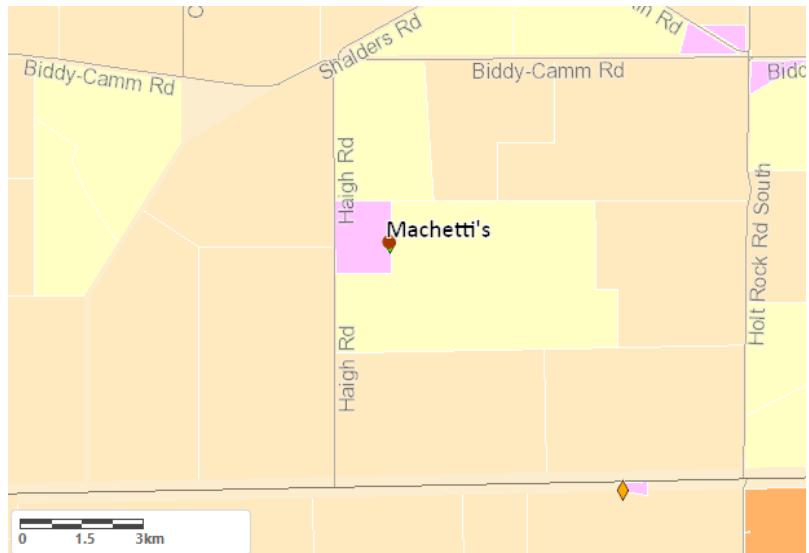
| | |
|---------------------------|--|
| Structure type | Standpipe and tanks |
| Tank capacity | 250kL tank on Stubbs Street |
| Standpipe Y/N | Yes, at tank on Stubbs Street |
| Farm bot Y/N | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Supply comments | Overflow water pumped from Lake Grace town supply to tank at Stubbs Street in emergency situations only. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Marchetti's tank



Aerial view of Marchetti's tank



Location map



Marchetti's tank



Tank gauge



Fill access point



New standpipe

Marchetti's tank site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 28449 |
| Catchment type | Rock catchment |
| Catchment area (ha) | 45 ha |

Location and coordinates

Location: Haigh Road ~5.2 km from Newdegate–Ravensthorpe Road

| | |
|-----------|----------------|
| Latitude | -33.041081087 |
| Longitude | 119.289676079 |
| Eastings | 713816.074836 |
| Northings | 6341828.604730 |

Water supply and access

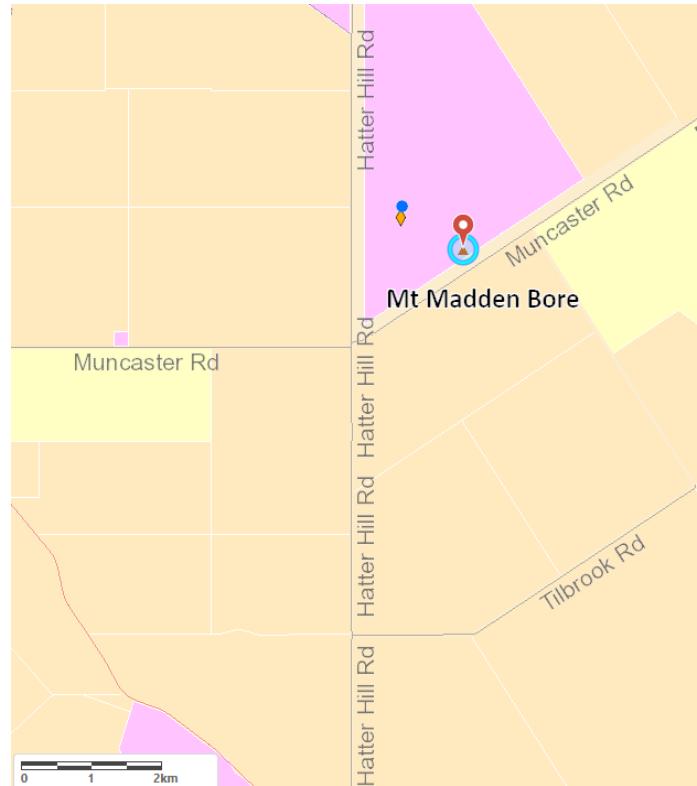
| | |
|---------------------------|--|
| Structure type | Concrete tank with roof |
| Bore capacity | 30 L/min bore top up |
| Tank storage | ~4,420kL |
| Standpipe Y/N | Yes, overhead standpipe and coupling connection at swipe-card location |
| Swipe card Y/N | Yes |
| Farm bot | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Mt Madden bore



Aerial view of Mt Madden bore



Location map



Bore tank 150 kL



Bore and solar pump



Tank outlet

Mt Madden bore site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 20110 |
| Catchment type | Bore |
| Catchment area (ha) | N/A |

Location and coordinates

Location: Hatter Hill Road or Muncaster Road

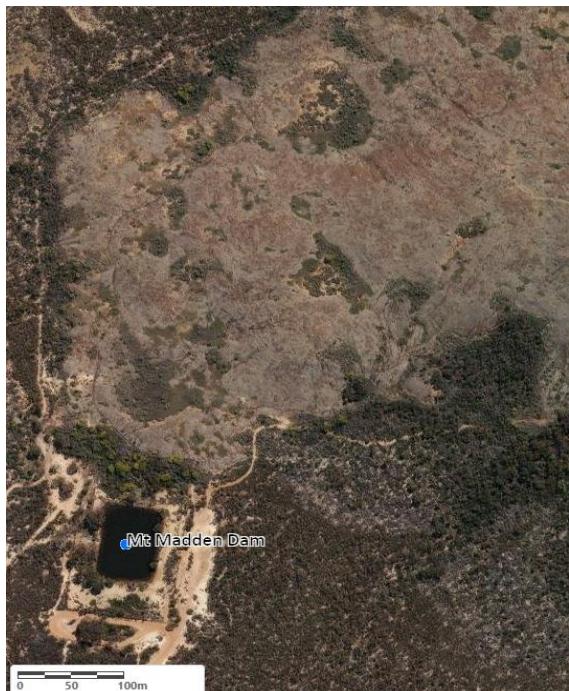
| | |
|-----------|----------------|
| Latitude | -33.247983011 |
| Longitude | 119.849422138 |
| Eastings | 765478.000017 |
| Northings | 6317599.999960 |

Water supply and access

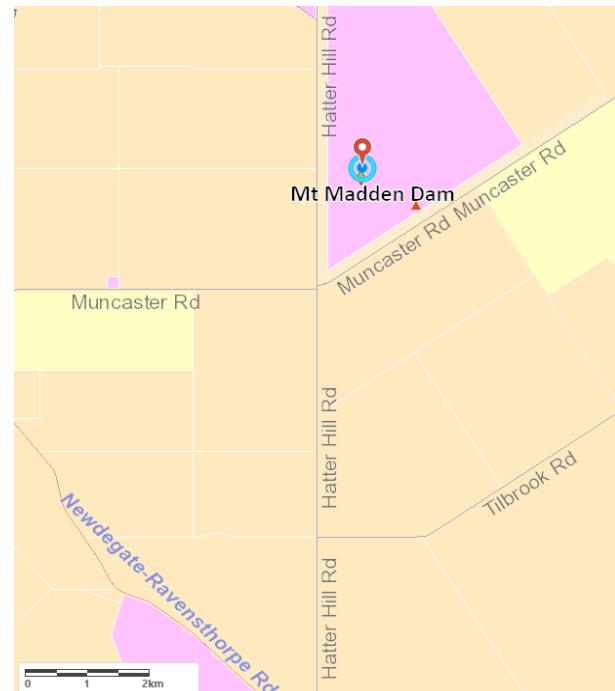
| | |
|---------------------------|--|
| Structure type | Bore and tank |
| Bore capacity | 70 L/min |
| Tank storage | 150kL |
| Standpipe Y/N | No |
| Pump available Y/N | No (solar pump for transfer of water from bore to tank) |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Mt Madden dam



Aerial view of Mt Madden dam



Location map



Mt Madden dam (2019)



New access pipe

Mt Madden dam site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 20110 |
| AA Dam # | 586 |
| Catchment type | Rock |
| Catchment area (ha) | 70 ha |

Location and coordinates

Location: Hatter Hill Road or Muncaster Road access

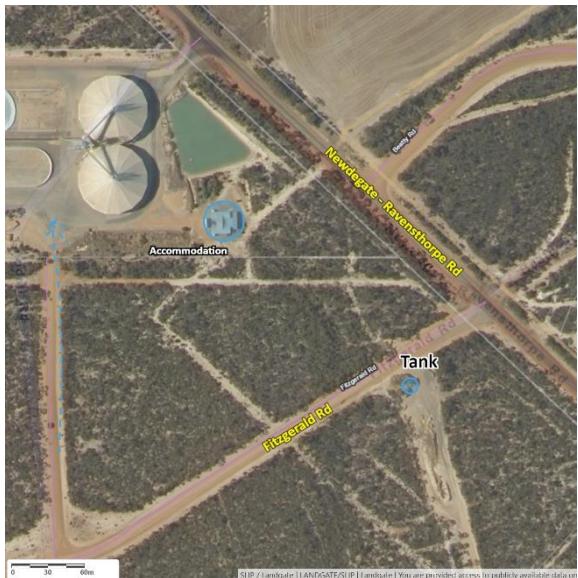
| | |
|-----------|----------------|
| Latitude | -33.242452448 |
| Longitude | 119.839948804 |
| Eastings | 764611.770733 |
| Northings | 6318237.499170 |

Water supply and access

| | |
|---------------------------|--|
| Structure type | Concrete-lined dam |
| Capacity | 13,600 cubic metres |
| Tank storage | No |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Supply comments | Recommend farmers do not access directly from dam. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Mt Madden CBH tank



Aerial view of Mt Madden



Location map



Tank



Tank outlets



Movable solar pump

Mt Madden CBH tank site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Road reserve |
| AA Dam # | N/A |
| Catchment type | CBH bitumen |
| Catchment area (ha) | 4 ha |

Location and coordinates

Location: Cnr Newdegate-Ravensthorpe Road & Fitzgerald Road

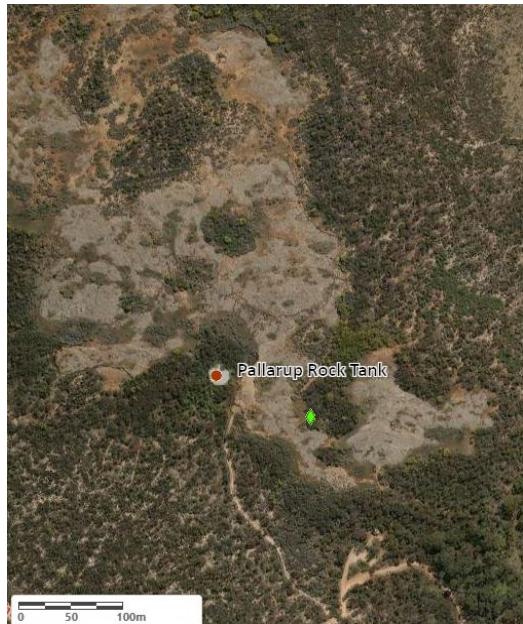
| | |
|-----------|-------------|
| Latitude | -33.34323 |
| Longitude | 119.84900 |
| Eastings | 765150.032 |
| Northings | 6307036.256 |

Water supply and access

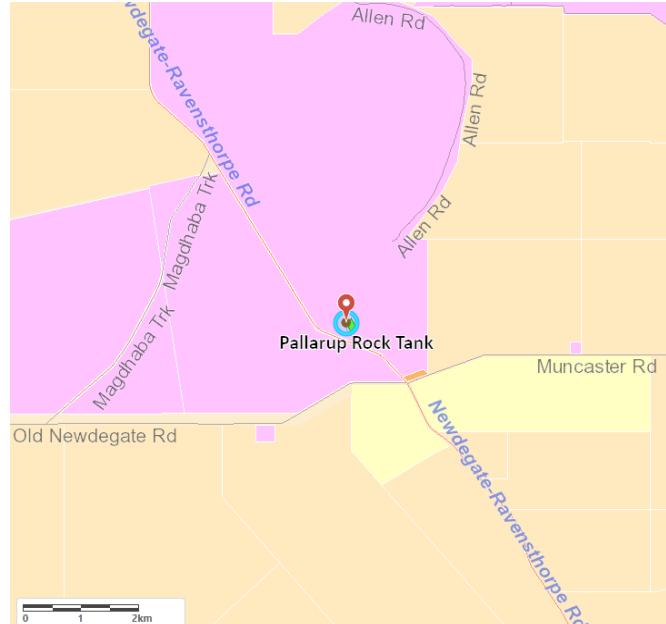
| | |
|--------------------------|---|
| Structure type | Tank |
| Dam capacity | Unknown |
| Tank storage | 280kL |
| Standpipe Y/N | No |
| Farm bot | No |
| Pump available Y/N | Not at tank (solar pump transfers water from dam to tank) |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contact | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Pallarup Rock tank



Aerial view of Pallarup Rock tank



Location map



Rock catchment wall and pipe (September 2019)



Concrete tank (Sep 2019)



Concrete tank inspection hatch (Sep 2019)

Pallarup Rock tank site description

| | |
|---------------------|--|
| Vesting | Water Corporation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated Reserve | 29860 Pallarup Nature Reserve |
| AA Dam # | 467 |
| Catchment Type | Rock |
| Catchment Area (ha) | 65 ha |

Location and coordinates

Location: Newdegate – Ravensthorpe Road ~1.2km from Old Newdegate Road

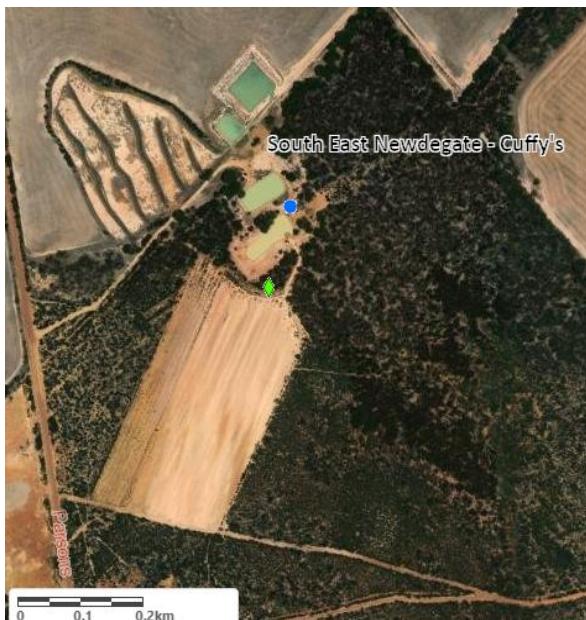
| | |
|-----------|----------------|
| Latitude | -33.255592889 |
| Longitude | 119.752770674 |
| Eastings | 756447.987860 |
| Northings | 6316997.578770 |

Water supply and access

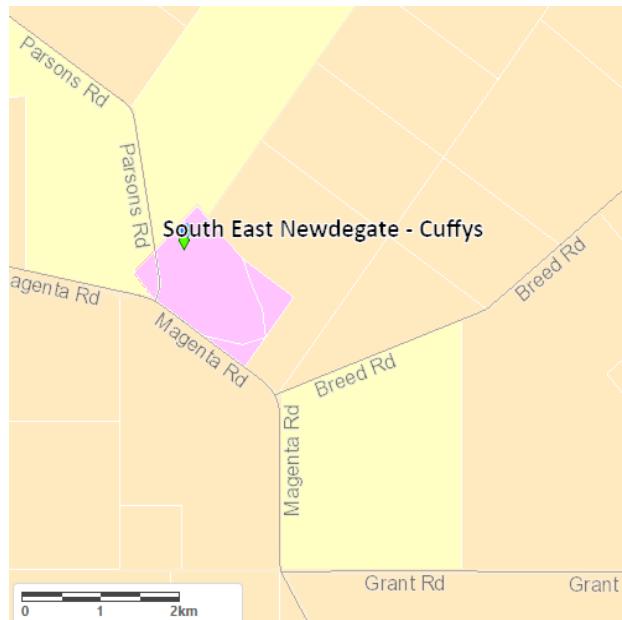
| | |
|---------------------------|--|
| Structure type | Concrete tank |
| Tank storage | 1,200kL |
| Standpipe Y/N | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Supply comments | Tank may leak |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

South-East Newdegate - Cuffy's (AA Dam # 563)



Aerial view of Cuffy's dams



Location map



Dam 1 (Dec 2021)



Tank 250 kL (Apr 2020)



Dam 2 (Dec 2021)



Coupling outlets on tanks



Solar panels (April 2020)

South-East Newdegate - Cuffy's site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 18961 |
| AA dam # | 563 |
| Catchment type | Earth |
| Catchment area (ha) | 8.46 ha |

Location and coordinates

Location: Parsons Road ~700 m from Magenta Road

| | |
|-----------|----------------|
| Latitude | -33.200403000 |
| Longitude | 119.125612000 |
| Eastings | 698134.041044 |
| Northings | 6324482.973440 |

Water supply and access

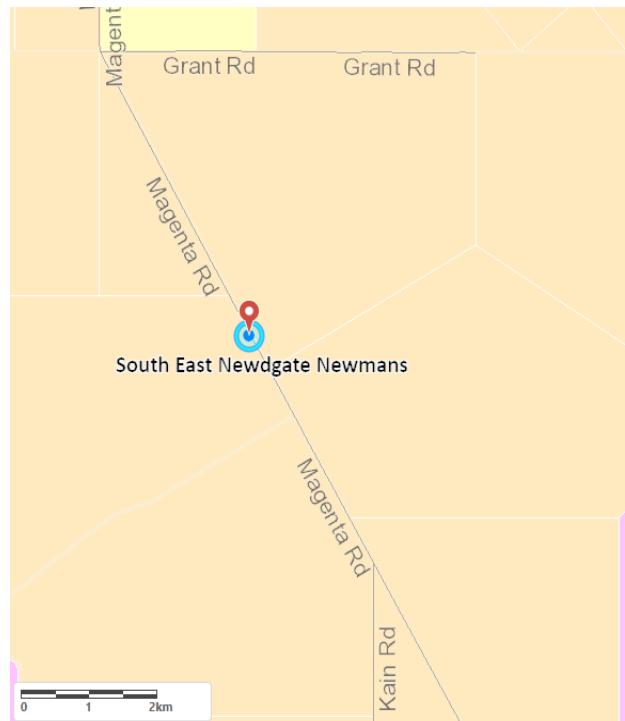
| | |
|---------------------------|---|
| Structure type | Dam 1 and 2, tank and pump |
| Dam capacity | Dam 1 = 6,160kL, Dam 2 = 5,078kL |
| Tank storage | 250kL |
| Camlock coupling sizes | 50 mm and 80 mm |
| Standpipe Y/N | No |
| Pump available Y/N | No (solar pump for transferring water between dams and to tank) |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

South-East Newdegate - Newman's



Aerial view of Newman's dam



Location map



Dam 1 (Dec 2021)

South-East Newdegate - Newman's site description

| | |
|---------------------|--|
| Vesting | Private with agreement in place expiry April 2026 |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private land |
| Catchment type | Earth |
| Catchment area (ha) | 5 ha |

Location and coordinates

Location: Magenta Road ~4.5 km south of Grant Road

| | |
|-----------|----------------|
| Latitude | -33.274828000 |
| Longitude | 119.162540000 |
| Eastings | 701406.027289 |
| Northings | 6316158.952560 |

Water supply and access

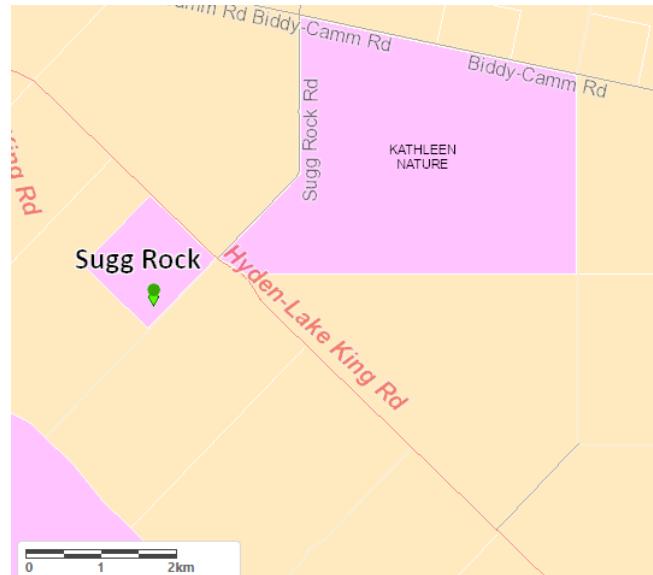
| | |
|---------------------------|--|
| Structure type | Dam |
| Capacity | 15,000kL |
| Tank storage | No |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Sugg Rock



Aerial view of Sugg Rock



Location map



Sugg Rock dam (Sep 2019)



Coupling on standpipe



Standpipe



Poly tanks

Sugg Rock site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 23842 |
| AA dam # | 554 |
| Catchment type | Rock |
| Catchment area (ha) | 2.81 ha |

Location and coordinates

Location: Sugg Rock Road off Hyden-Lake King Road

| | |
|-----------|----------------|
| Latitude | -33.035742151 |
| Longitude | 119.613832632 |
| Eastings | 744109.464452 |
| Northings | 6341713.850870 |

Water supply and access

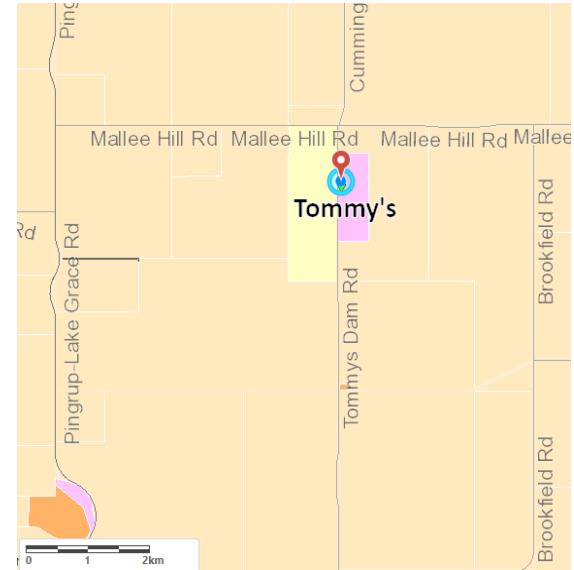
| | |
|---------------------------|--|
| Structure type | Dam, tanks and standpipe |
| Dam Capacity | 10,554kL |
| Tank storage | 2 x poly tanks 45kL each |
| Standpipe Y/N | Yes |
| Swipe card Y/N | Yes |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Tommy's dam



Aerial view of Tommy's



Location map



Tommy's dam with gauges (Dec 2021)



Coupling



Coupling



Tank 250 kL



Solar pump and panels

Tommy's dam site description

| | |
|---------------------|--|
| Vesting | Department of Water and Environmental Regulation |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | 23598 |
| Catchment type | Earth |
| Catchment area (ha) | 5.87 ha |

Location and coordinates

Location: Tommy's Dam Road off Mallee Hill Road

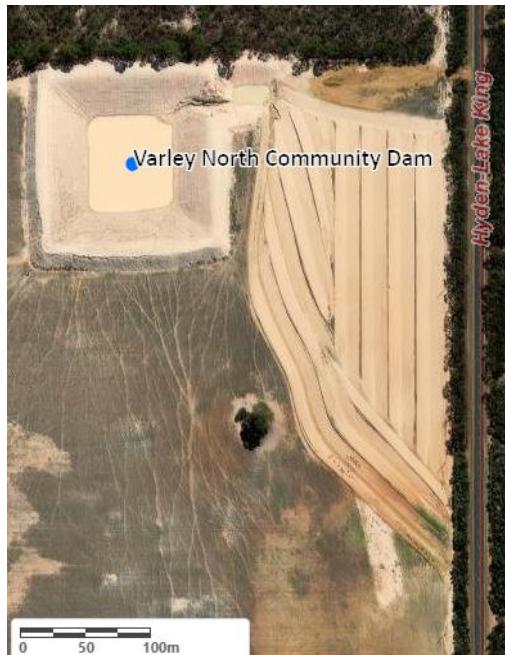
| | |
|-----------|----------------|
| Latitude | -33.252866522 |
| Longitude | 118.520708577 |
| Eastings | 641658.332072 |
| Northings | 6319648.716640 |

Water supply and access

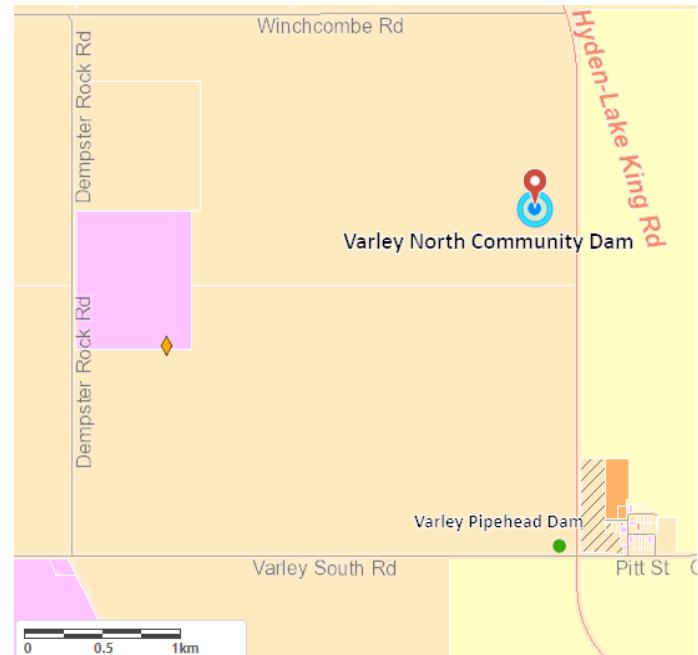
| | |
|---------------------------|--|
| Structure type | Earth dam, tank and solar pump |
| Dam capacity | 10,601kL |
| Tank storage | 250kL |
| Camlock coupling sizes | 50 mm and 80 mm |
| Standpipe Y/N | No |
| Farm bot | Yes |
| Pump available Y/N | No (solar pump to transfer water from dam to tank) |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Varley North community dam



Aerial view of Varley North



Location map



Varley North community dam



Silt dam and catchment (Apr 2020)

Varley North community dam site description

| | |
|---------------------|--|
| Vesting | Private with agreement in place with Alan Sutherland |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private land |
| Catchment type | Catchment A: Earth. Catchment B: CBH |
| Catchment area (ha) | Earthered (Catchment A) 4.11 ha, CBH (Catchment B) 5.1 ha |

Location and coordinates

Location: Hyden-Lake King Road ~2.2 km from Varley South Road

| | |
|-----------|----------------|
| Latitude | -32.776081321 |
| Longitude | 119.503831562 |
| Eastings | 734517.675626 |
| Northings | 6370761.144760 |

Water supply and access

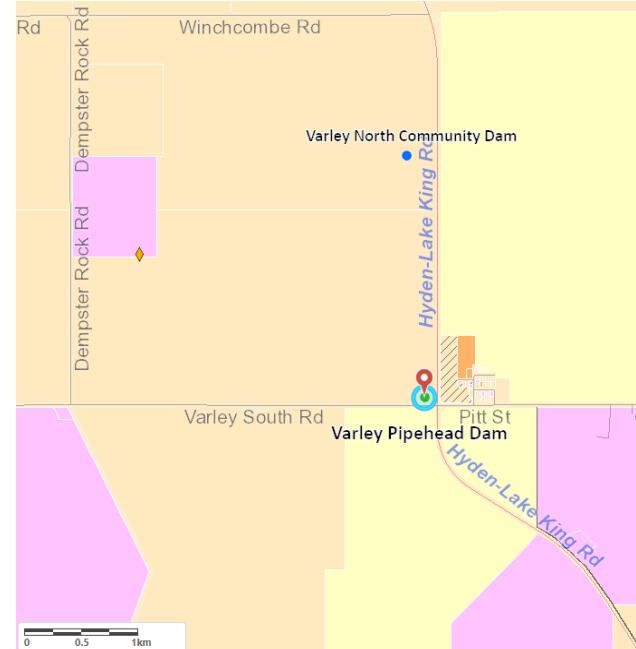
| | |
|---------------------------|--|
| Structure type | Dam |
| Dam capacity | Main dam 36,454kL, silt trap 1,441kL |
| Tank storage | No |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Varley Pipehead dam



Aerial of Varley Pipehead dam



Location map



Varley Pipehead dam (Jan 2022). Pictures: Dean Sinclair



Solar pump



Tank at Varley Pipehead dam

Varley Pipehead dam site description

| | |
|---------------------|--|
| Vesting | Private with agreement in place with Alan Sutherland |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | Private land |
| Catchment type | Varley CBH bin, surrounding road, 4 ha catchment |
| Catchment area (ha) | 6.7 ha (CBH catchment area) |

Location and coordinates

Location: Corner of Hyden-Lake King Road & Varley South Road

| | |
|-----------|----------------|
| Latitude | -32.795016046 |
| Longitude | 119.505546406 |
| Eastings | 734628.580410 |
| Northings | 6368657.470460 |

Water supply and access

| | |
|---------------------------|--|
| Structure type | 2 x dams, standpipe and tank |
| Capacity | 4,000kL & 3,000kL |
| Tank storage | 250kL |
| Standpipe Y/N | Yes |
| Pump available Y/N | No (solar pump to transfer water from dam to tank) |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Supply comments | Dams feed the standpipe on Varley South Road. |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Lake Magenta dam



Aerial view of Lake Magenta dam



Location map



Left and above: Lake Magenta Dam and sign

Lake Magenta dam site description

| | |
|---------------------|--|
| Vesting | Shire of Lake Grace |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | R20274 |
| Catchment type | Earth |
| Catchment area (ha) | 5 ha |

Location and coordinates

Location: Magenta Road ~3.44 km north of Giles Road

| | |
|-----------|-------------|
| Latitude | -33.36741 |
| Longitude | 119.24453 |
| Eastings | 708822.559 |
| Northings | 6305730.387 |

Water supply and access

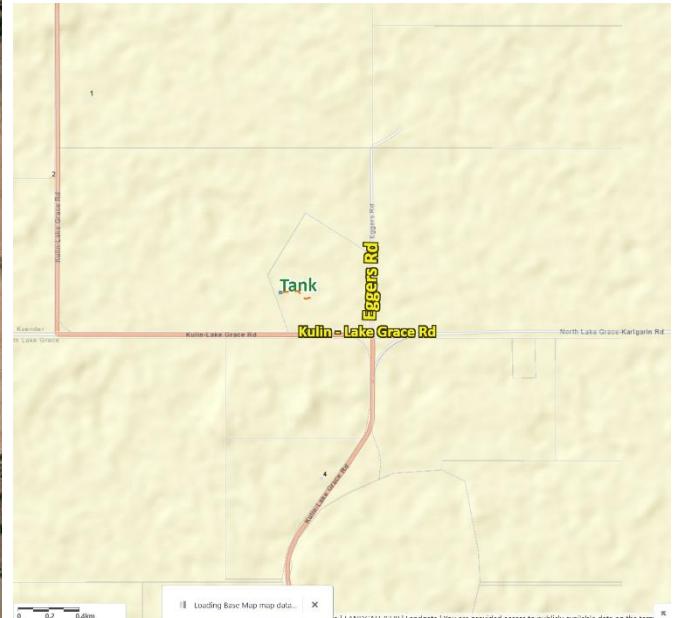
| | |
|---------------------------|--|
| Structure type | Dam |
| Capacity | 15,000kL |
| Tank storage | No |
| Standpipe Y/N | No |
| Pump available Y/N | No |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

Description of community water supplies

Lake Grace north dam



Aerial view of Lake Grace north tank and dam



Location map



Lake Grace north Dam



Tank



Lake Grace north dam with daisy covers installed

Lake Grace north dam site description

| | |
|---------------------|--|
| Vesting | Shire of Lake Grace |
| Purpose | Strategic community water supply for emergency stock water and fire fighting |
| Associated reserve | R18067 |
| Catchment type | Earth |
| Catchment area (ha) | 2.2 ha |

Location and coordinates

Location: Kulin – Lake Grace Road, ~550m west of Eggers Road

| | |
|-----------|-------------|
| Latitude | -32.95169 |
| Longitude | 118.46581 |
| Eastings | 637010.589 |
| Northings | 6353115.273 |

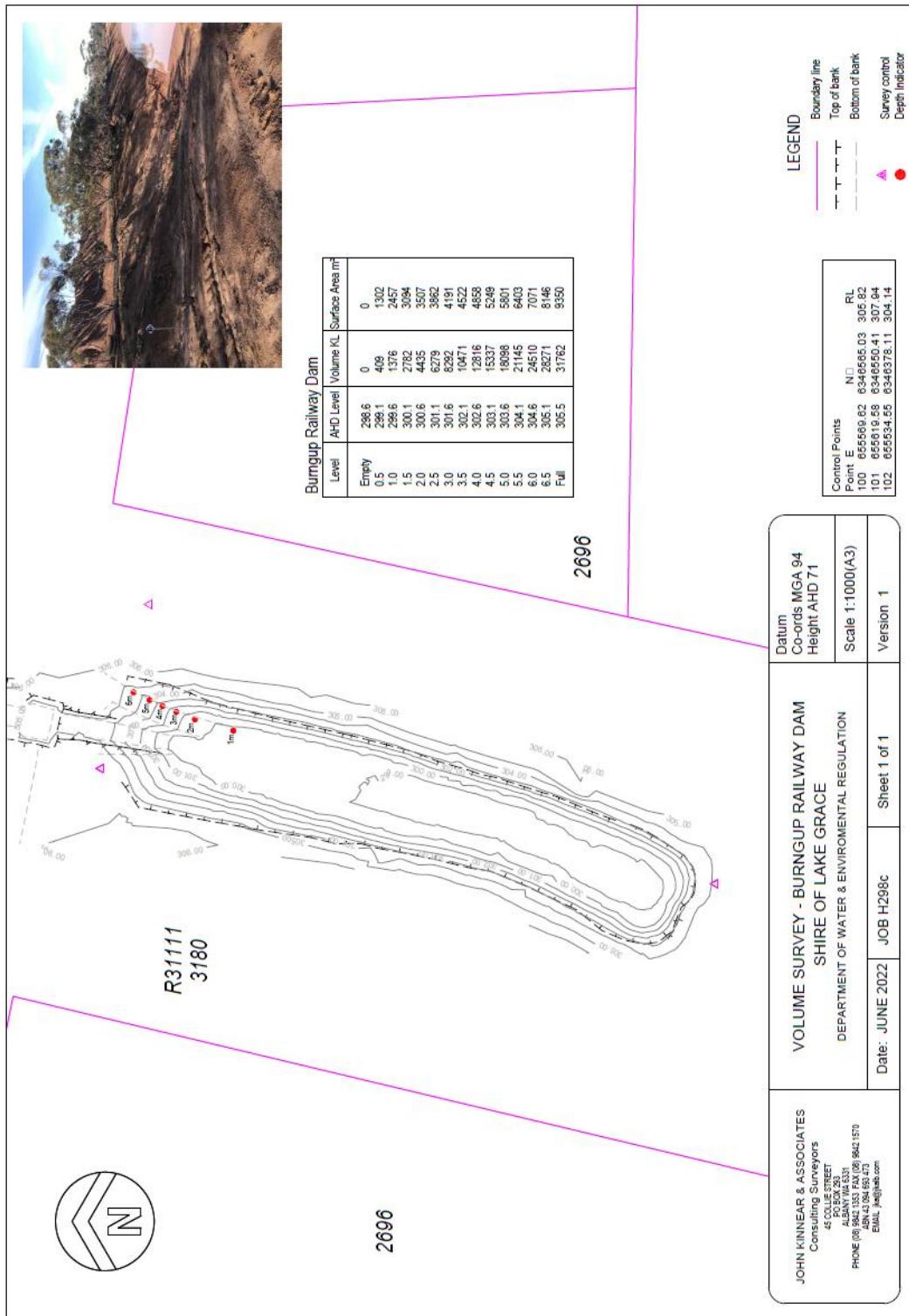
Water supply and access

| | |
|---------------------------|--|
| Structure type | Dam and tank |
| Tank storage | Yes |
| Tank capacity | 280kL |
| Standpipe Y/N | No |
| Pump available Y/N | Yes, Solar pump |
| Heavy vehicle access | Yes |
| Turnaround area | Yes |
| Emergency access contacts | Manager Infrastructure Services 0448 089 092 / 9890 2500 |

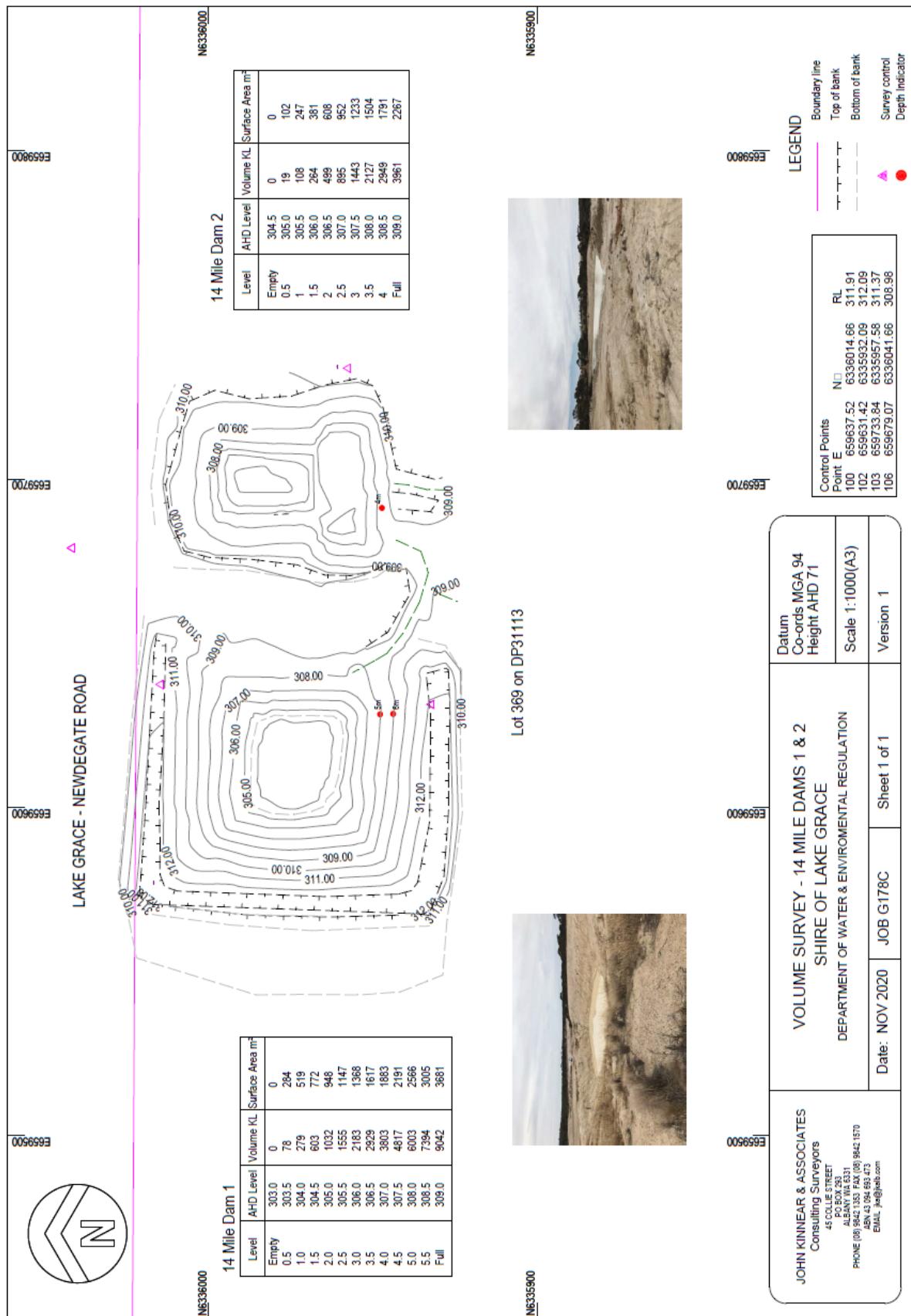
Appendices

Appendix A – Dam surveys

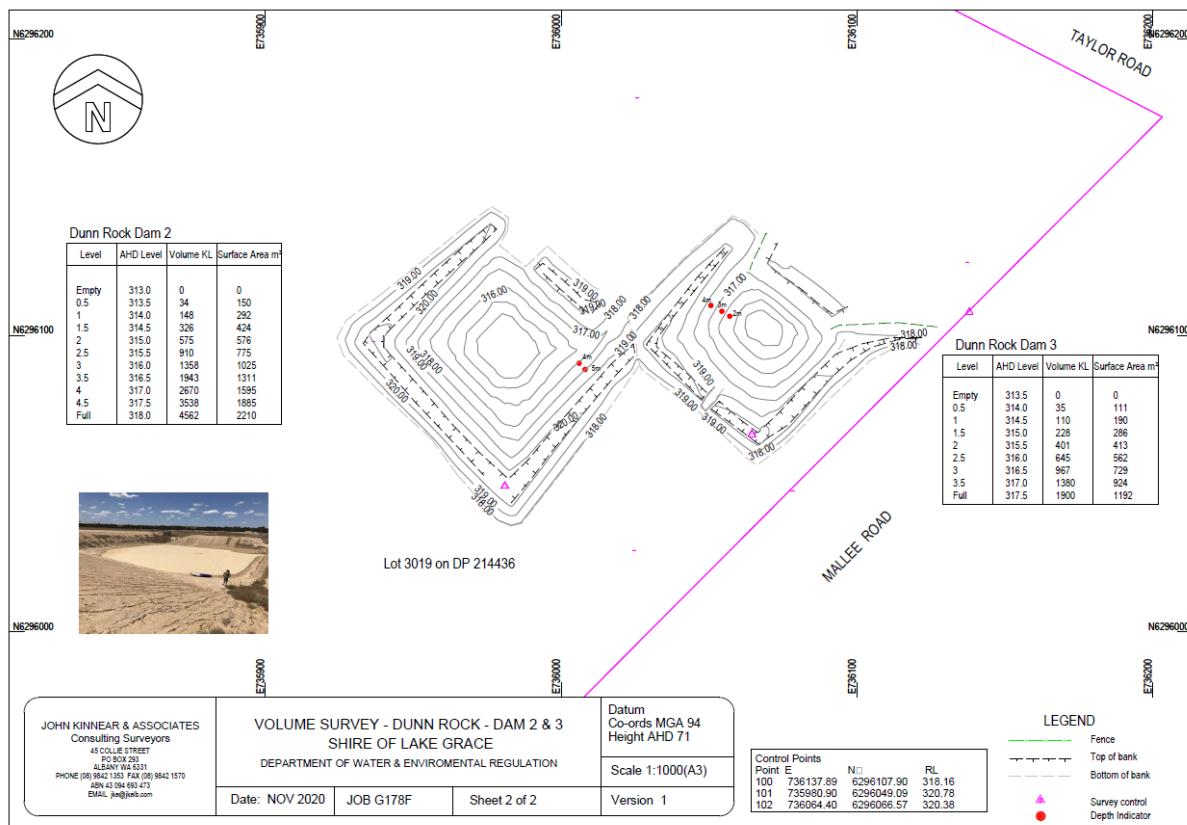
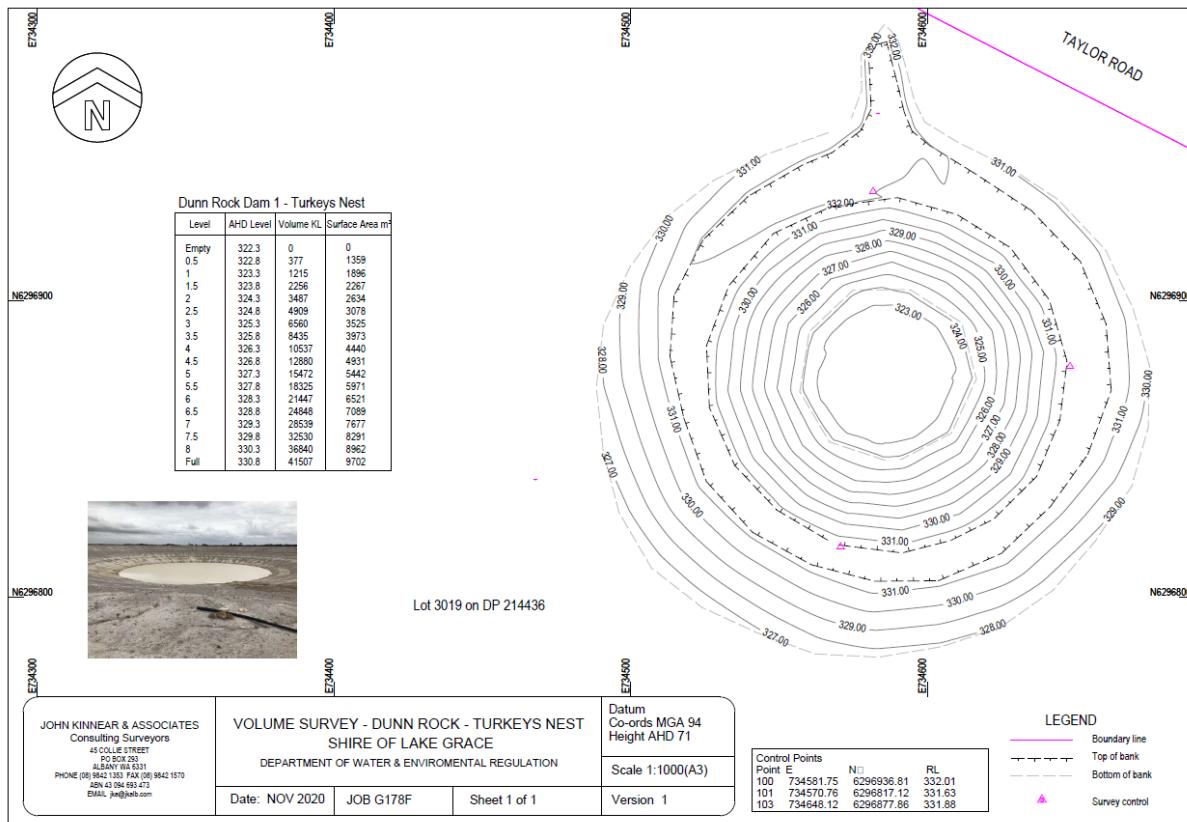
Burnup Railway dam survey



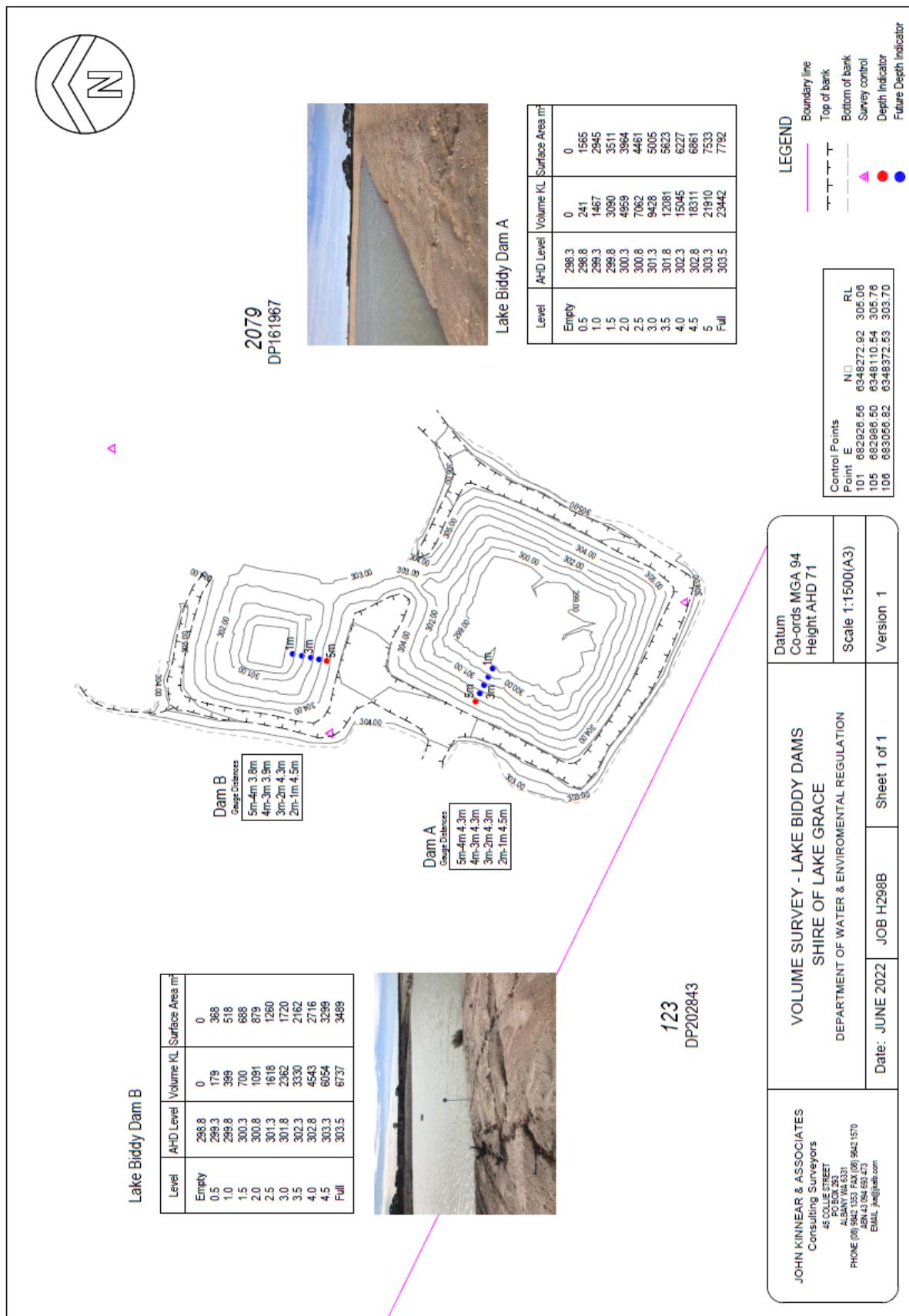
14 Mile dam survey



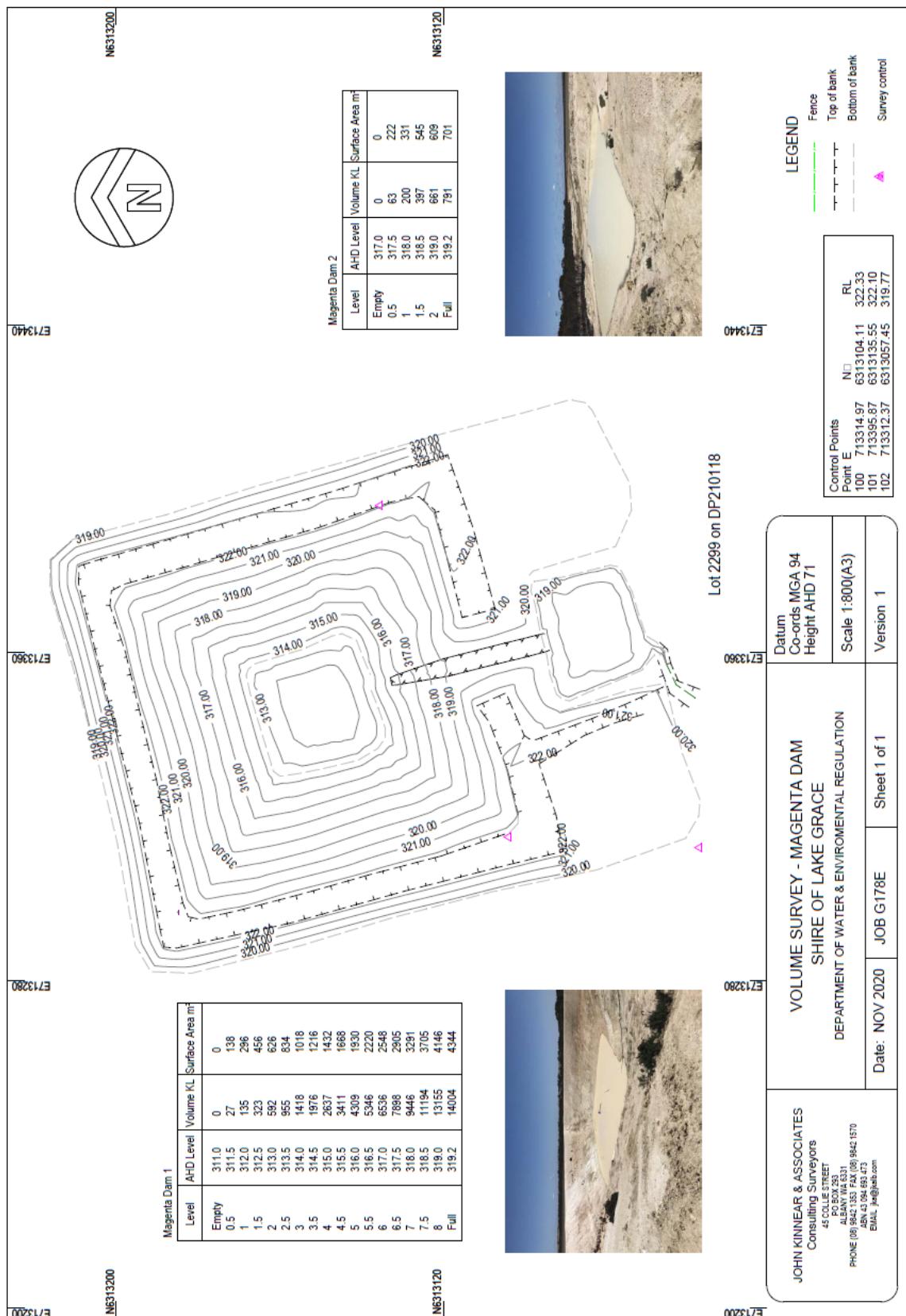
Dunn Rock dam surveys



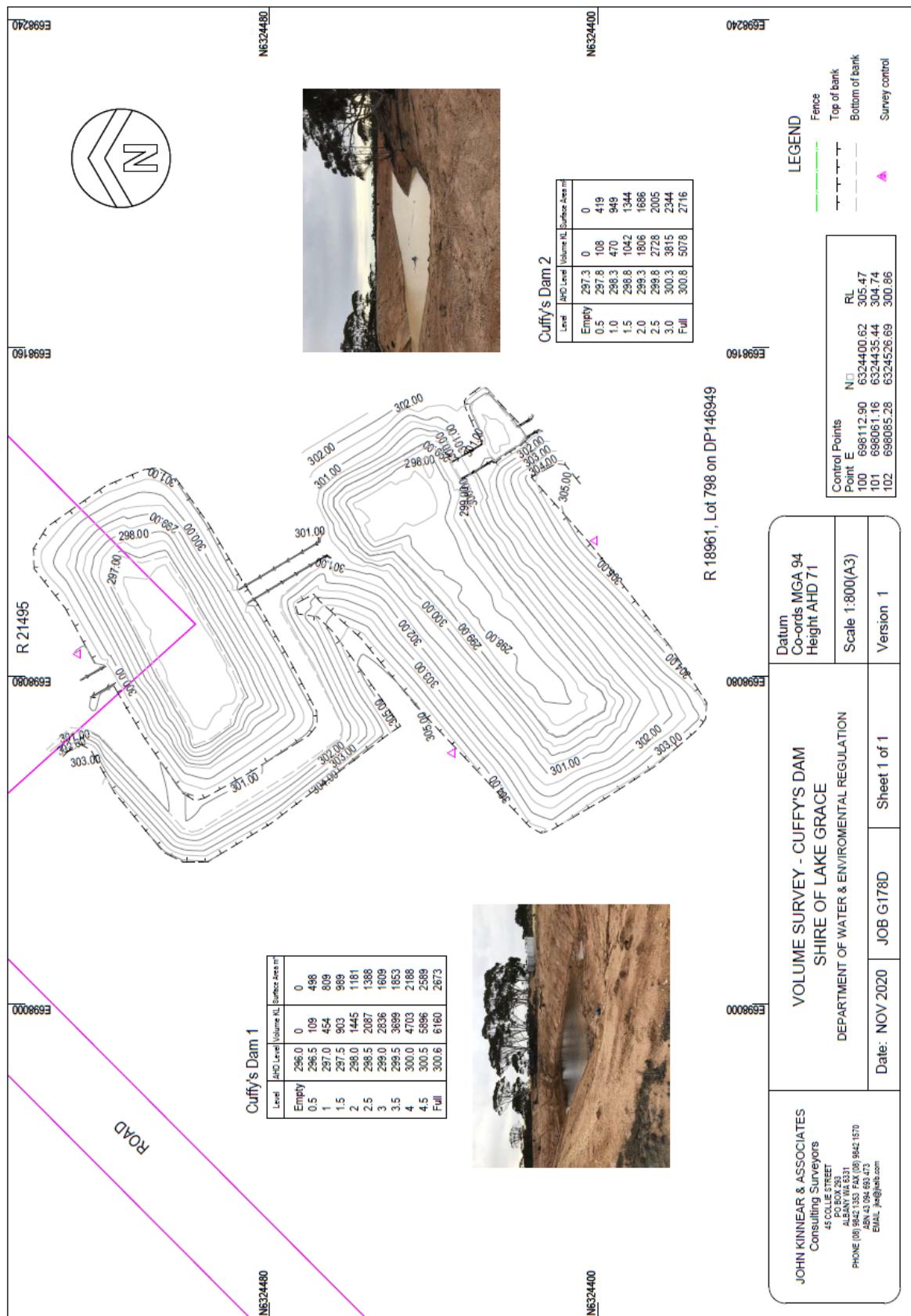
Lake Biddy dam A & B survey



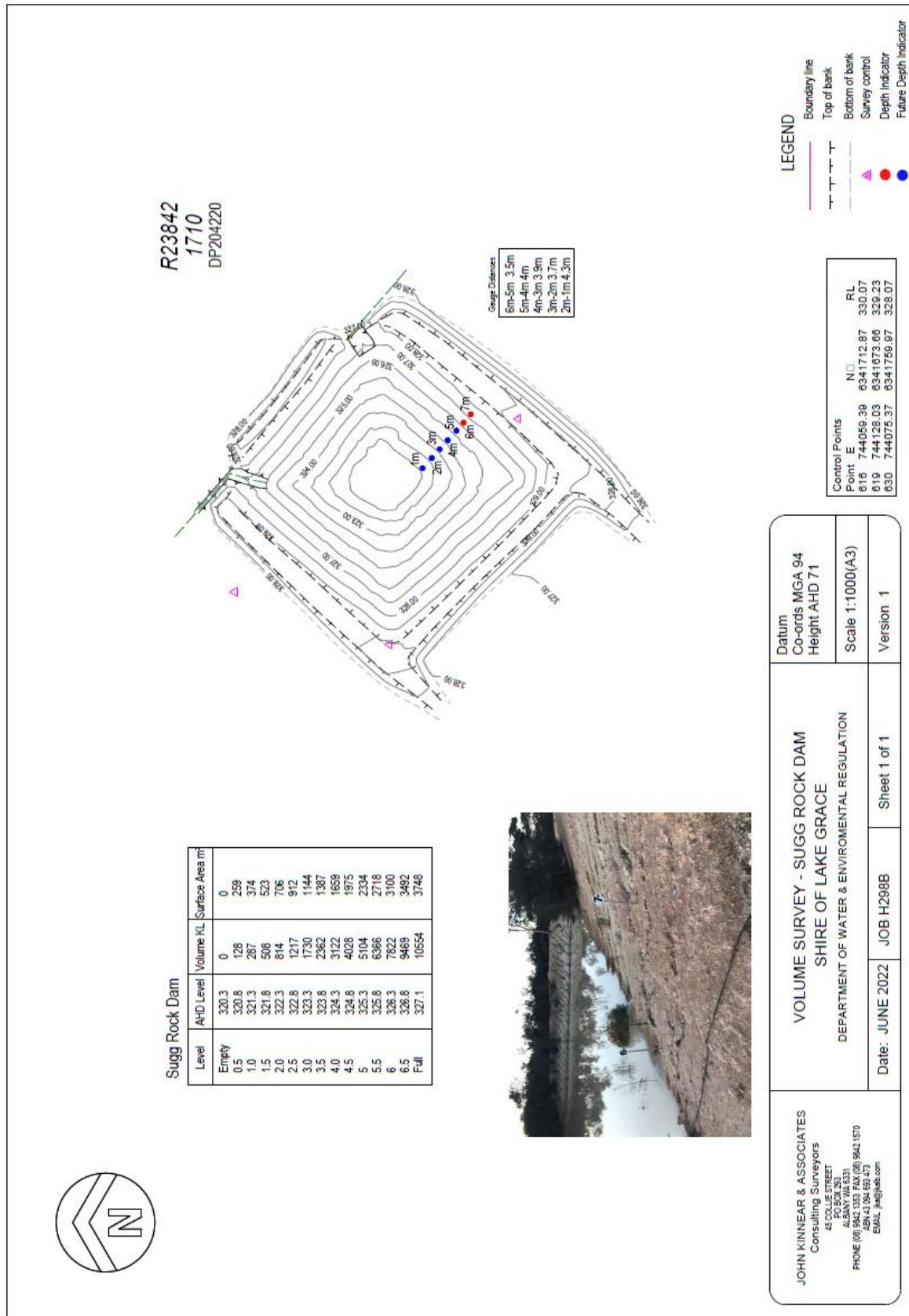
Magenta North/Ardler Road dam survey



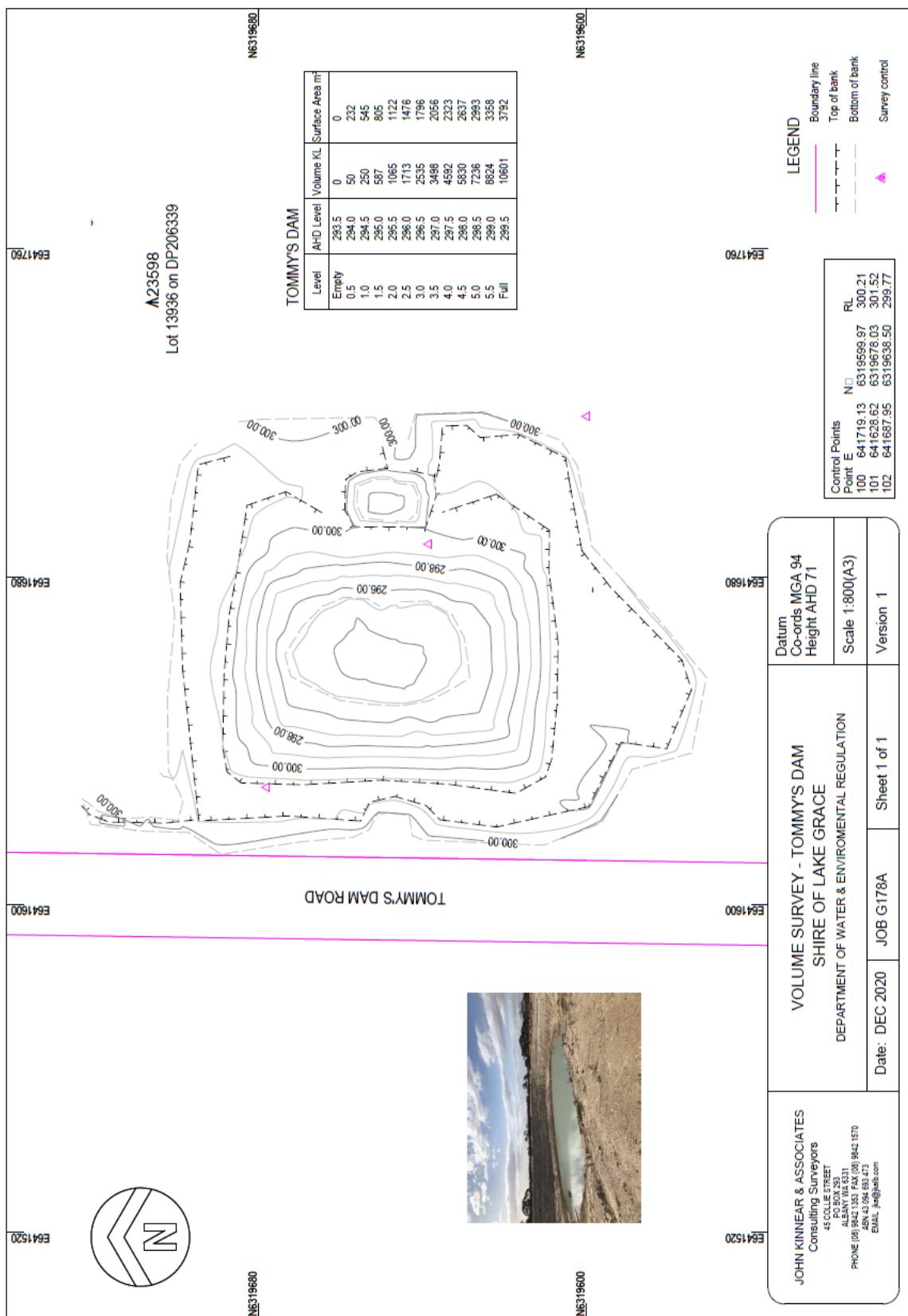
South East Newdegate Cuffy's dam survey



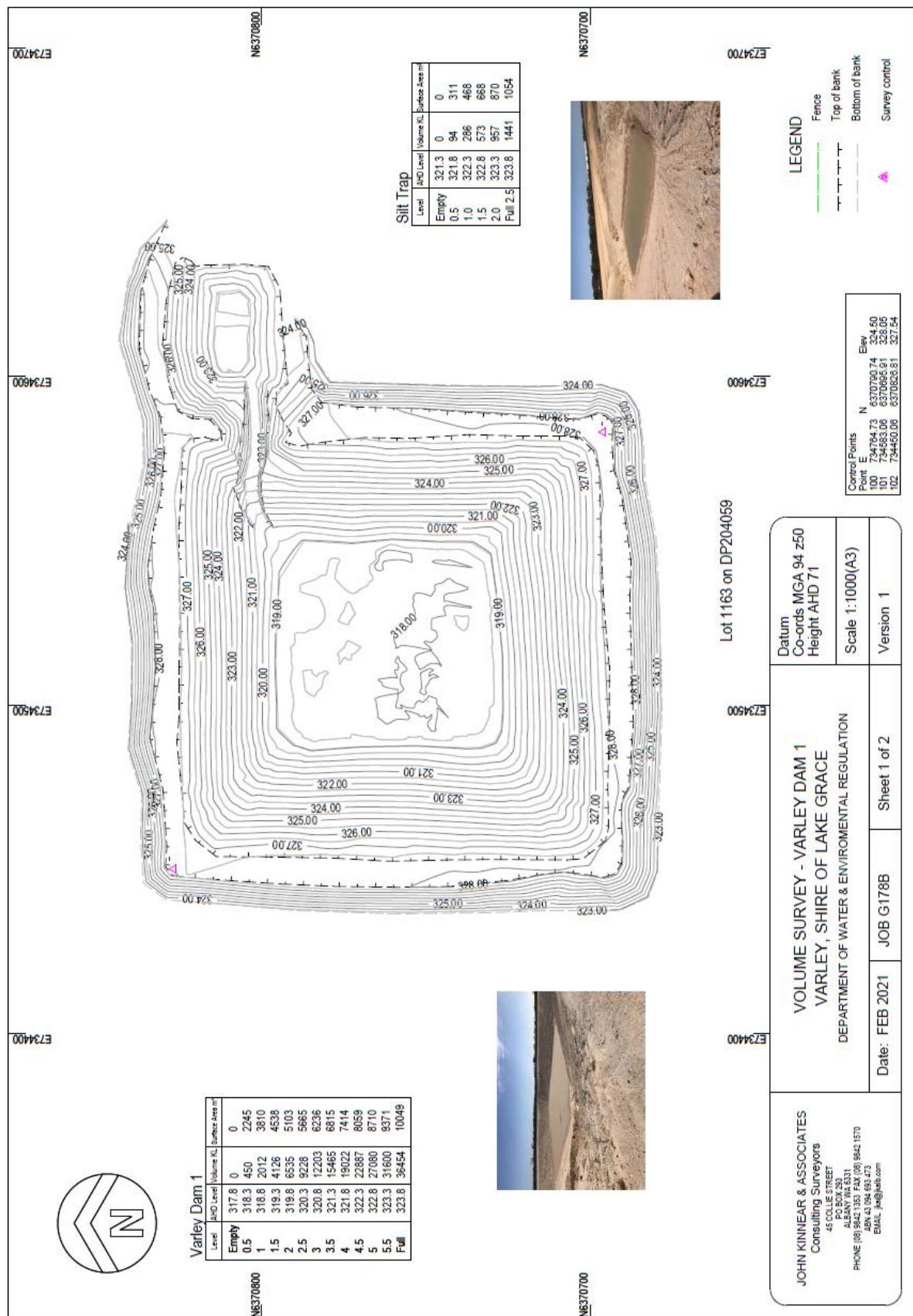
Sugg Rock dam survey



Tommy's dam survey



Varley North community dam survey



Glossary

| | |
|------------------------|---|
| Camlock | A male hose coupling fixed for connection of a water hose. Camlocks can be attached to fill points such as tanks or standpipes to allow access to water supply. Camlock sizes vary from site to site and generally include 50 mm (2 inch), and 80 mm (3 inch) as a standard. At some sites a 100 mm (4 inch) camlock has been included for firefighting purposes. |
| Catchment types | Earth – land cleared, cambered and compacted to provide a catchment area for surface water. Bitumen – catchment lined with bitumen to allow capture of surface water. Rock catchment – rock that slopes, has containment walls to capture surface water to a storage source (e.g. a tank or a concrete dam). |
| Bore | a drilled casing that accesses ground water to provide a water supply. |
| CBH | water is captured from CBH grain silo storage facility and stored in a dam or tank. |
| Farm bot | A device fitted to some tanks to regularly record the water level and feed this information into a website. You can access this website at app.farmbot.com.au (Login ID: public.access Password: access1) to see water tank levels for tanks fitted with farm bots. |
| Fill point | Location where a water supply can be accessed from using camlock fittings either via standpipe, swipe card system, tank or bore. |
| Non-potable | Water not suitable for human consumption. |
| Solar pump | A pump powered via solar energy that pumps water from one location to another (e.g. from dam to dam or from dam to tank). |
| Staff gauges | A marker measuring tool positioned at surveyed depths in a dam to indicate water levels. |
| Standpipe | A pipe overhead, on a plinth or raised off the ground to provide a fill point for water supply. |
| Swipe card | A metered fill point requiring a card to be swiped to start pumping system. Contact the shire for further information. |
| Vesting | Person or governing agency with responsibility for managing land. |

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