Modification of Minister's Approval

Section 75W of the *Environmental Planning and Assessment Act 1979*

As delegate for the Minister for Planning and Public Spaces under delegation executed on 14 September 2011, we the Independent Planning Commission of New South Wales (the Commission) hereby approve the modification of the project approval referred to in Schedule 1, subject to the conditions outlined in Schedule 2.

Member of the Commission **Member of the Commission**

Sydney 2020

SCHEDULE 1

Project Approval

Project Approval:	08_0255 granted by the then Acting Deputy Director-General, Development Assessment & Systems Performance on 11 January 2012
For the following:	Elf Mushroom Farm and Substrate Plant Project, including: • development of a mushroom farm at Londonderry with the capacity to produce up to 220 tonnes of mushrooms per week; and • development of a substrate plant at Mulgrave with the capacity to produce 3,200 tonnes of Phase 1 substrate per week.

Modification 3

Modification Application:	08_0255 MOD 3 (Project Approval) – Straw bale storage area, stormwater management system and the western tree corridor
Proponent:	Elf Farm Supplies Pty Ltd
Consent Authority:	Independent Planning Commission
Land:	Lot 14 DP 1138749 and part Lot 13 DP 1138749 108 Mulgrave Road, Mulgrave Lot 138 DP 752037 521 The Northern Road, Londonderry

SCHEDULE 2

The project approval is modified as follows:

1. Delete the definitions for "Department", "Project", "RTA", "Secretary" and "Stages 1 to 3 at the Substrate Plant site" and insert the following definitions in alphabetical order:

Department	NSW Department of Planning, Industry and Environment, or its successors in title
Project	The development described in the EA, comprising the construction and operation of a mushroom farm at 521 The Northern Road, Londonderry; and the expansion of the existing mushroom substrate plant at 108 Mulgrave Road, Mulgrave; as modified by the conditions of this approval
RMS	NSW Roads and Maritime Services
Secretary	Planning Secretary of the Department of Planning, Industry and Environment, or nominee
Stages 1 to 2 at the Substrate Plant	The development stages shown on the plan in Appendix 2

2. Insert the following definitions in alphabetical order:

AHD	Australian Height Datum
ARI	Average Recurrence Interval
CEMP	Construction Environmental Management Plan
MOD 3	The modification as described in the Environmental Assessment, titled *Mushroom Substrate Plant Project Modification No 3 Environmental Assessment* dated May 2018, prepared by Perram and Partners, the letter Response to Submissions titled *RE: Elf Farm Supplies Mushroom Substrate Plant, Mulgrave Responses to Submissions – MOD 3* dated 13 November 2018, prepared by Perram and Partners and the letter titled *RE: Elf Farm Supplies Mushroom Substrate Plant, Mulgrave Responses to Submissions – MOD 3* dated 30 January 2019, prepared by Perram and Partners
Noise Barrier	Located at the Substrate Plant site and as described in MOD 3
PCA	Principal Certifying Authority
Rail Corridor	The Richmond railway line and associated infrastructure, adjoining the southern boundary of the Substrate Plant site.
WMP	Water Management Plan

3. Delete all references to "shall" and replace with "must".

4. Delete all references to "RTA" and replace with "RMS"

In Schedule 2: Administrative Conditions

5. Delete Condition 2 and replace with the following:

TERMS OF APPROVAL

2. The Proponent must carry out the Project in accordance with the:
   (a) EA;
   (b) statement of commitments (see Appendix 1);
   (c) site layout plans and drawings in the EA;
   (d) MOD 1;
   (e) MOD 2; and
   (f) MOD 3.

6. Delete Condition 7B and replace with the following:

7B. The Proponent must maintain the MOD 3 tree corridor identified in Figure 1 of this approval for the duration of operation of the Substrate Plant site.

7. Insert new Condition 16 immediately after Condition 15 as follows:

EVIDENCE OF CONSULTATION

16. Where conditions of this approval require consultation with an identified party, the Proponent must:
    (a) consult with the relevant party prior to submitting the subject document to the Secretary for approval; and
    (b) provide details of the consultation undertaken including:
        (i) the outcome of that consultation, matters resolved and unresolved; and
        (ii) details of any disagreement remaining between the party consulted and the Proponent, and how the Proponent has addressed the matters not resolved.

In Schedule 3: Specific Environmental Conditions – Substrate Plant Site

8. Delete Condition 1 and replace with the following:

1. The Proponent must prepare and implement a Construction Environmental Management Plan for the Substrate Plant site to the satisfaction of the Secretary. This Plan must:
    (a) be prepared in consultation with DPIE Water and the EPA;
    (b) be submitted for approval prior to commencement of construction, and include:
        (i) a noise and vibration management plan, including a noise monitoring program that can be used to demonstrate compliance with the construction noise criteria in Condition 18 below;
        (ii) an air quality management plan;
        (iii) a soil and water management plan, including details of the erosion and sediment control measures to be used on site;
        (iv) a flora and fauna management plan;
        (v) a heritage management plan;
        (vi) a traffic management plan; and
        (vii) a waste management plan.

9. Insert new conditions 1B and 1C immediately after Condition 1A as follows:

UPDATED CEMP – MOD 3 WORKS

1B. Prior to the commencement of the MOD 3 construction works, the Proponent must prepare an updated Construction Environmental Management Plan (CEMP) for the Substrate Plant site to the satisfaction of the Secretary. The updated CEMP must:
    (a) be prepared in accordance with the requirements of Schedule 3, Condition 1 and Schedule 5, Condition 2 of this approval;
    (b) be prepared in consultation with Sydney Trains;
    (c) detail the measures that are to be implemented to minimise impacts associated with the MOD 3 construction works; and
    (d) include:
        (i) plans which confirm the stormwater management system will not result in pooling or stormwater impacts to the Rail Corridor; and
        (ii) certification from a suitably qualified and experienced geotechnical or structural engineer which confirms the construction of the noise barrier and filling of the outdoor bale storage area will not impact upon the adjacent Rail Corridor.

1C. The Proponent must:
    (a) not commence the MOD 3 construction works until the updated CEMP is approved by the Secretary; and
    (b) implement the most recent version of the updated CEMP approved by the Secretary for the duration of the MOD 3 construction works.

10. Renumber existing conditions 10(b) and 10(c) as conditions 10(c) and 10(d), respectively.

11. Insert new Condition 10(b) as follows:

    (b) ensure straw bales stored in the outdoor bale storage area are:
        (i) readily accessible by firefighting crews; and
        (ii) separated from buildings and other assets (excluding the noise barrier and northern perimeter wall) to prevent a fire from spreading;

12. Insert new conditions 17D and 17E immediately after Condition 17C as follows:

UPDATED WATER MANAGEMENT PLAN – MOD 3

17D. Prior to the commencement of construction of the stormwater management system approved under MOD 3, the Proponent must prepare an updated Water Management Plan (WMP) for the Substrate Plant site to the satisfaction of the Secretary. The updated WMP must:
    (a) be prepared in accordance with the requirements of Schedule 3, conditions 17 to 17C of this approval;
    (b) be prepared in accordance with the updated Stormwater Catchment Plan for the Substrate Plant site (see Appendix 2A of this approval); and
    (c) detail the measures that are to be implemented to manage stormwater impacts associated with the MOD 3 works.

17E. The Proponent must:
    (a) not commence construction of the MOD 3 stormwater management system until the updated WMP is approved by the Secretary; and
    (b) implement the most recent version of the updated WMP approved by the Secretary.

13. Insert new Condition 17F immediately after Condition 17E as follows:

FLOOD COMPATIBLE MATERIALS – MOD 3

17F. The Proponent must ensure any structures approved under MOD 3 that are built below the 100-year ARI flood level, including the noise barrier and the northern perimeter wall, are constructed from flood compatible building components.

Note: *The 100-year ARI flood level at the Substrate Plant site is RL 17.3 metres AHD.*

14. Delete Condition 21 and replace with the following:

21. The Proponent must ensure the noise barrier is constructed:
    (a) prior to the importation of fill for the expansion of the outdoor bale storage area; or
    (b) as otherwise agreed to in writing by the Secretary.

15. Insert new Condition 21A immediately after Condition 21 as follows:

21A. The Proponent must continue to implement the 'other noise mitigation measures' approved by the Department in its letter dated 18 July 2016 until the noise barrier referred to in Schedule 3, Condition 21 of this approval is constructed.

16. Insert new conditions 27 and 28 immediately after Condition 26 as follows:

PROTECTION OF PUBLIC INFRASTRUCTURE

27. Before the commencement of the MOD 3 construction works, the Proponent must:
    (a) consult with the relevant owner and provider of services that are likely to be affected by the MOD 3 construction works to make suitable arrangements for access to, diversion, protection and support of the affected infrastructure;
    (b) prepare a dilapidation report identifying the condition of all public infrastructure in the vicinity of the site (including roads, gutters and footpaths); and
    (c) submit a copy of the dilapidation report to the Secretary and Council.

28. Unless the Proponent and the applicable authority agree otherwise, the Proponent must:
    (a) repair, or pay the full costs associated with repairing, any public infrastructure that is damaged by carrying out the MOD 3 construction works; and
    (b) relocate, or pay the full costs associated with relocating, any public infrastructure that needs to be relocated as a result of the MOD 3 construction works.

17. Insert new Condition 29 immediately after Condition 28 as follows:

WORKS AS EXECUTED PLANS – MOD 3

29. Before the issue of the final Occupation Certificate for the works associated with MOD 3, works-as-executed drawings signed by a registered surveyor demonstrating that the stormwater drainage and finished ground levels have been constructed as approved, must be submitted to the PCA and Sydney Trains.

18. Insert new conditions 30 and 31 immediately after Condition 29 as follows:

RAIL CORRIDOR AND ASSOCIATED EASEMENTS

30. The Proponent must ensure:
    (a) no construction or maintenance works associated with MOD 3 occur within the Rail Corridor or its associated easements;
    (b) stormwater drainage associated with MOD 3 is not discharged into the Rail Corridor; and
    (c) fill is not spread or stockpiled within the Rail Corridor or its associated easements,

    except with the prior approval of Sydney Trains.

31. The Proponent must ensure that straw bales stacked immediately adjoining the southern section of the noise barrier (adjacent to the Rail Corridor) do not exceed the height of the noise barrier.

In Schedule 4: Specific Environmental Conditions – Mushroom Farm Site

19. Delete Condition 1 and replace with the following:

1. The Proponent must prepare and implement a Construction Environmental Management Plan for the Mushroom Farm site to the satisfaction of the Secretary. This Plan must:
    (d) be prepared in consultation with DPIE Water and the EPA;
    (e) be submitted for approval prior to commencement of construction, and include:
        (i) a noise and vibration management plan, including a noise monitoring program that can be used to demonstrate compliance with the construction noise criteria in Condition 15 below;
        (ii) an air quality management plan;
        (iii) a soil and water management plan, including details of the erosion and sediment control measures to be used on site;
        (iv) a flora and fauna management plan;
        (v) a heritage management plan, including the programs/procedures to be implemented in the event that previously unidentified relics are discovered (Condition 21)
        (vi) a waste management plan; and
        (vii) a construction traffic management plan which addresses haulage routes, traffic safety and the number of truck movements required to import the identified fill for the site.

In Schedule 5: Environmental Management and Reporting

20. In Condition 3, delete the words “Within six months of commencement of operations” and replace with the words “By 30 September 2020”.

21. In Condition 3A, delete the words “Within six months of the approval of MOD 2” and replace with the words “By 31 March 2021”.

22. Delete Condition 4 and replace with the following:

REVISION OF STRATEGIES, PLANS AND PROGRAMS

4. Within three months of:
   (a) the submission of an incident report under Condition 5 of Schedule 5;
   (b) the submission of an annual review under Condition 3 of Schedule 5;
   (c) the submission of an Independent Environmental Audit under Condition 3A of Schedule 5; and
   (d) the approval of any modification of the conditions of this approval,

   the strategies, plans and programs required under this approval must be reviewed.

4A. If necessary to improve the environmental performance of the project or cater for a modification, the strategies, plans and programs required under this approval must be revised, to the satisfaction of the Secretary. Where revisions are required, the revised document must be submitted to the Secretary for approval within six weeks of the review required by Condition 4 of Schedule 5.

Note: *This is to ensure strategies, plans and programs are updated on a regular basis and to incorporate any recommended measures to improve the environmental performance of the development.*

23. Delete Condition 8 and replace with the following:

8. Within three months from the date of the approval of MOD 3, the Proponent must make the following information (unless commercially sensitive) freely available on a publicly accessible website, as it is progressively required under the approval:
   (a) all current statutory approvals, including this approval and any modifications to it;
   (b) plans and programs required under this approval;
   (c) technical analysis/reports of monitoring results, which have been reported in accordance with the various plans and programs approved under the conditions of this approval;
   (d) a complaints register, which is to be updated on a monthly basis;
   (e) a copy of any review as required under Condition 3 of Schedule 5 (over the last five years);
   (f) updates on the progress of the construction works associated with MOD 1, MOD 2 and MOD 3; and
   (g) any other material as required by the Secretary.

In the Appendices

24. Delete Appendix 1 and replace with new Appendix 1.

25. Delete Appendix 2 and replace with new Appendix 2.

26. Insert new Appendix 2A immediately after Appendix 2.

APPENDIX 1
Revised Statement of Commitments
August 2019

1. Mushroom Farm – 521 The Northern Road, Londonderry

Outcome	Commitment	Timing
Environmental Management	Prepare and subsequently implement and environmental management plan for construction, consistent with the environmental assessment and conditions of the approval as amended by this application	Prior to the issue of any Construction Certificate
	Identify and clearly mark vegetation on site to be retained and not be removed.	Prior to any construction works commencing on site
	Instruct all contractors involved with the construction on site the requirements of the environmental management plan prepared for the site	Prior to and during any construction works on site.
Minimise Soil erosion and sediment depositions	Implement erosion and sediment controls consistent with the environmental management plan and keeping them in place on the site until the works are completed or the areas are rehabilitated and the need for the controls are no longer required.	Prior to any construction works commencing on site and maintained until no longer required on site.
	Progressively rehabilitate areas that are disturbed during the construction phase with grass or landscaping as outlined in the environmental management plan	During the construction phase.
Control Nuisance Dust	Implement the following dust mitigation measures as follows: • Restrict vehicles to a defined route on the site; • Limit vehicle speeds on site for unsealed surfaces; • Maintain the haul routes on site for the fill trucks in a damp state; • Apply temporary stabilisation material to any exposed surface that is unlikely to be disturbed for a period of longer than 3 months and • Rehabilitate finished exposed surfaces as soon as practically possible to reduce the potential for wind generated dust nuisance.	During the construction phase.
Minimise construction noise	Implement the following construction noise mitigation measures.	During the construction phase.

	• Construct the proposed northern acoustic mound as soon as practical in the construction phase on the development; • Select appropriate plant and equipment having regard to controlling noise emissions including reversing alarm noise; • Reduce operating speeds of equipment where practical and switch off idle plant when not in active use on the site; • Arrange vehicular access to work areas on site to allow for forward vehicle travel and minimising reversing or manoeuvring wherever possible; • Provide site induction for all contactors and personnel on the correct use of plant and equipment to minimise any potential noise impact; • Regular inspection on site of the plant and equipment to ensure the noise criteria are met; • Comply with standard construction hours for working on the site; • Establish a noise complaint procedure with contact phone number and logging and response protocols; • Review the use of mobile plant reversing alarms including altering work practices and or replacing with less intrusive devices where practical.	
Manage Construction Traffic	Prepare in consultation with the Roads and Maritime Services (RMS) and implement a traffic management plan for the construction phase including suitable signage on The Northern Road of heavy vehicle entry.	Prior to any construction commencing on site.
	Construction the intersection of the site access and The Northern Road to a Type CHR in accordance with the Austroads Guide to Road Design Part 4A: *Unsignalised and Signalised Intersection*	Prior to the issue of any occupation certificate for the development.
Minimise Visual Impact	Implement the following measures to reduce visual impact: • External building colours and finishes to reduce glare and minimise visual obtrusiveness; • Construct and landscape mounds along the northern property boundary and The Northern Road Boundary as shown on the amended approved plans as soon as practically possible once the construction works have commenced on the site.	During construction phase and prior to the issue of any occupation certificate for the development.

	• Plant the proposed landscape mounds and areas using a mixture of semi advanced trees, shrubs and ground covers to achieve early coverage and height enhancement; • Maintain the planting on the mound and other landscape areas and replace any vegetation that has died until the landscaping has been established; • Retain as much as possible of the existing mature native plantings along The Northern Road front setback area. • Provide additional plantings in the front setback area of The Northern Road especially in the south eastern corner to restrict view from vehicles travelling north along The Northern Road; • Provide additional plantings along the southern property boundary to reduce the view of the development from the adjoining residence; • During the construction minimise the areas of physical disturbance to the site at any one time and revegetate the disturbed areas that are visible from beyond the site that are not required as hardstand.	
Protect Cultural Heritage	Implement the following management practices/protocols: • Should an Aboriginal object be identified on site during the construction phase, work is to cease, and notification be given the Office of Heritage and Environment. (OEH) A qualified archaeologist and representative of the Deerubbin LALC be engaged and notified. The archaeologist is to develop an appropriate mitigation or management strategy in consultation of with OEH and the LALC and the EMP be amended. • Should skeletal remains be discovered during construction works the works are to cease immediately on site and be reported to the Police. If the remains are of Aboriginal origin notification be given the Office of Heritage and Environment. (OEH) A qualified archaeologist and representative of the Deerubbin LALC be engaged and notified.	During the construction phase.

Protect Flora and Fauna	Implement the flora and fauna measures as outlined in the report prepared by Fraser Ecological Consulting: • Prepare a Vegetation Management Plan (VMP) prior to issue of any Construction Certificate • avoid removing remnant trees wherever possible; • providing fencing between retained areas and the proposed development to prevent degradation from livestock and other potential impacts including building and road construction and asset protection zone establishment. • collect stormwater from the development in dams; • plant local native species from the Castlereagh Woodlands along The Northern Road frontage and elsewhere for landscaping to enhance the remnant of this community; • maintain pasture and suppress weeds.; • 'Integrated Bushfire and Vegetation Management Plan' be prepared to ensure that the threatened plants and their potential habitat are protected in perpetuity whilst ensuring the APZ complies with Inner Protection Area requirements of Planning for Bushfire Protection 2006. The plan would be prepared by an ecological restoration consultant in conjunction with a bushfire consultant to ensure compliance with the Rural Fire Service's GTAs. The works would done by a qualified and experienced bush regeneration company under the supervision of the project ecologist. Signage would be installed to remind contractors what actions are not permitted in the APZ to ensure protection of *Persoonia nutans* (Nodding Geebung) and *Dillwynia tenuifolia*. • All erosion and sediment controls (i.e. geotextile sediment fence and straw bales) shall be in place before any works begin so as to protect sedimentation of the riparian zone. Techniques used for erosion and sediment control on building sites are to be adequately maintained at all times and must be installed in accordance with EPA guidelines. All techniques shall remain in proper operation until all development activities have been completed and the site fully stabilised.	Prior to issue of any construction certificate. Prior to works commencing on site. During construction phase.

	• The site will be managed in accordance with the *Protection of the Environment Operations Act 1997* by way of implementing appropriate measures to prevent sediment run-off, excessive dust, noise or odour emanating from the site during the construction of the development. Pre-construction works refers to all site preparation activities prior to the commencement of • construction works on site. These works would include tagging of all threatened plants by an ecologist, on-site consultation with bushfire consultant about APZ establishment works to clearly identify what vegetation is required to be retained and removed. Includes installation of signage to notify contractors of the presence of threatened plant species and what actions are not permitted within the APZ. • Primary restoration works, as defined under this VMP, include the completion of primary and secondary weed control and protective fencing. Practical completion of the primary restoration phase is determined by the project ecologist at which point all primary restoration actions need to have been completed.	
Environmental Management	Prepare an operational management plan for the mushroom farm consistent with the conditions of the development consent as amended the relevant revised commitments	Prior to the issue of any occupation certificate.
Minimise Operational Noise	Operate the mushroom farm to maintain the noise levels at nearby sensitive receptors within the EPA NSW Noise Policy for Industry	During operation of the mushroom farm
	Implement the following noise mitigation measures: • Implement noise control recommendations during construction and operational phases including mechanical plant to acoustic performance measures, walls and roof of plantroom to minimum acoustic performance, roof cladding acoustic requirements as outlined in the report prepared by Acoustic Consulting Engineers dated 5th February 2019. • Limit vehicle speeds to maximum 20kph. • Potential acoustic enclosure to sections of the development area Refer Acoustic Assessment Report dated 20th August 2018 which provides alternate solution to reduce the potential impact on the property known as 1	During construction phase. Prior to the issue of any occupation certificate. During operation of the mushroom farm.

	Thomas Road which adjoins the property to the south if there is an issue with noise from the operation of the mushroom farm causing a problem with this dwelling . • Incorporate the operational noise management measures into the operational management plan.	
Reducing Offensive Odour	Implement the following odour controls as follows: • Keep spent substrate retained on site for refining under cover to prevent any further wetting; • Turn and blend spent substrate from time to time to assist in aeration; • Manage and maintain the wash down water recycling system to prevent potential odour generation; • Include in the Operation Management Plan a procedure for recording and responding to any complaints that may be received pertaining to the operation of the mushroom farm;	Prior to the issue of any occupation certificate. During operation of the mushroom farm.
Effectively manage operational water	Install the approved water management system to manage water generated from the operation of the mushroom farm and prevent any discharge of the process water and maximise the collection, reuse of the recycled water in the operation.	During operation of the mushroom farm.
	Provide an on-site wastewater (sewerage) system to cater for the likely peak potential loads of the fully development operation.	During operation of the mushroom farm.
	Provide adequate wash down water system that will recycle and reuse the water in the mushroom farm operation.	During the operation of the mushroom farm.
Bushfire Protection	Implement the following measures to minimise bushfire risk to the mushroom farm: • Provide a 25metre APZ to be retained for all elevations; • Provide landscaping in a manner not to compromise the integrity of the APZ. • Construction level of BAL 40 to be provided for the building; • Driveway, turning circles, suitable surface material, suitable width to be constructed for RFS vehicles; • Provide on-site a static water supply 20,000Litres (water tank, not dependent upon electricity for pumping) to supplement the reticulated supply including suitable water delivery line;	During Construction phase. Prior to issue of occupation certificate. During operation of the mushroom farm.
	• Provide suitable hoses capable of reaching all elevations of the building; • Underground provision of services where possible. If gas to be installed to be undertaken and maintained to Australian Standards; • Preparation of a Bushfire Emergency Evacuation Plan;	
Monitor Operation and Performance	Continue to monitor operation of the mushroom farm as identified in the operational management plan	During operation of the mushroom farm.

2. Substrate Plant – Construction

Outcome	Commitment		Timing
Environmental management	3.1	Prepare and subsequently implement an environmental management plan for construction, or modify the existing EMP as required, consistent with this EA and conditions of approval.	Prior to issue of construction certificate
	3.2	Instruct all construction personnel of the requirements for environmental management on the site.	Prior to and during construction
Minimise soil erosion and sediment deposition	3.3	Implement erosion and sediment controls consistent with the erosion and sediment control plan and keep in place with adequate maintenance until work is complete or they are no longer required.	Prior to commencement of earthworks and thereafter as long as necessary
	3.4	Progressively rehabilitate areas disturbed during construction with landscaping or hardstand as designed	During construction
Control nuisance dust	3.5	Implement the following dust mitigation measures: • limit vehicle speeds on unsealed surfaces; • maintain unsealed haul routes for fill trucks in a damp state; and • rehabilitate finished surfaces as soon as possible either with landscaping or hardstand, according to intended use.	During construction
Minimise construction noise	3.6	Implement construction noise mitigation measures as follows: • avoid operating the bulldozer and compactor simultaneously during filling operations; • when concrete pours are taking place, locate concrete trucks and pumps in a manner that will maximise screening to residential properties to the south and west; • construct the noise barrier approved under MOD 3 prior to importing fill for the expanded bale storage area; • adopt construction practices recommended by the EPA for best management and best available technology economically achievable; • select construction plant and equipment having regard to controlling noise emissions, including reversing alarm noise; • where practicable schedule the noisiest activities to occur during parts of the day when ambient noise levels are higher; • undertake audits at receiver locations to monitor noise from site construction;	During construction

Outcome	Commitment		Timing
		• establish a noise complaints procedure with contact phone number and logging and response protocols; • undertake construction activities in accordance with AS 2436:1981, Guide to Noise Control on Construction, Maintenance and Demolition Sites, with all equipment demonstrating compliance with the noise levels recommended in the standard.	
Manage construction traffic	3.7	Maintain the intersection of the site access road and Mulgrave Road in a safe condition suitable for heavy construction traffic including vehicles delivering fill.	During construction
Minimise visual impact	3.8	Implement measures to reduce visual impact of the development as follows: • commence screen planting around the periphery of the extended platform area as early as possible during the project; • during construction, minimise the area of physical disturbance to the land at any one time and revegetate any disturbed areas visible from beyond the site that are not required as hardstand; • mulch fill batters as soon as possible after completion and maintain them to achieve total vegetation cover; • continue to maintain previous landscaping and screen planting on the site to maximise screening of the plant; • incorporate building materials of the same colour and texture as used in the existing plant, which minimise glare and visual obtrusiveness.	During construction
Protect cultural heritage	3.9	Implement the following protocols as required: • should any Aboriginal object be identified during construction, work should cease and notification given to OEH, a qualified archaeologist and Aboriginal representatives of the Deerubbin LALC. The archaeologist is to develop an appropriate mitigation or management strategy in consultation with OEH and DLALC and the EMP is to be amended accordingly; • should skeletal remains be discovered, cease work at the location and report the find to the police. If the remains prove to be of Aboriginal origin advise OEH, a qualified archaeologist and Aboriginal representatives of the Deerubbin LALC.	During construction
Protect flora and fauna	3.10	Suppress weeds on the construction site and protect existing landscape planting that is to be retained.	During construction

3. Substrate Plant – Operation

Outcome	Commitment		Timing
Environmental management	4.1	Prepare and subsequently implement an environmental management plan for operation, or modify the existing EMP, consistent with this EA and conditions of approval.	Prior to issue of occupation certificate
Production limit	4.2	Maintain average weekly production of Phase 1 substrate within upper limits as follows: • Currently 1,600 tonnes • When approved 2,400 tonnes • When approved 3,200 tonnes	During operation
Minimise operational noise	4.3	Operate the plant in a manner to maintain noise levels at nearby sensitive receptors within EPA criteria.	During operation
	4.4	Implement the following noise mitigation measures: • undertake detailed design of buildings and structures to meet requirements specified in section 7.4 of the substrate plant noise assessment report and where relevant, the assumptions in the acoustic review for modification 1, as follows: o Building walls (materials storage shed and bale breaking area) shall consist of concrete to a height of 2 metres above FFL followed by galvanised steel frame and galvanised wall/roof sheeting nominally 0.6 mm BMT and a minimum of Rw22; o Fan plant rooms for new pre-wet processing tunnels to south (Tunnels 1-6) and north (Tunnels 7-10) constructed with concrete walls (min Rw50) and composite roof/ceiling OR in situ concrete (min Rw40) o Penetration of fan rooms to be reviewed by acoustic consultant and appropriately detailed to avoid de=rating the structure; o New processing tunnels to be of concrete construction; o Construction materials of working hall between processing tunnels (1-6 and 7-10) typically concrete wall construction nominal installed noise reduction in the order of 40 dB (min Rw46) and composite roof/ceiling nominal installed noise reduction in the order of 25 dB (Rw31); o Proposed external fans identified on current design drawings (No 41, 42, 43, 44, 52, 53, 66, 67, and 68) to incorporate inlet/discharge attenuators; o Fan room intake for new Phase 2/3 building (Fan No 110-134 inclusive, 25 fans) subject to acoustic review;	During design and operation

Outcome	Commitment		Timing
		○ Internal walls and roof of tunnels within phase 2/3 building precast or cast in situ concrete and/or hebel panels/blocks; ○ Building wall cladding (Phase 2/3 building) consisting of insulated colorbond sandwich panels consistent with existing Phase 2/3 building proving a nominal installed noise reduction in the order of 23 dB(A) (Rw28 or greater). ○ Building roof cladding consisting of sheet metal (min 0.42 BMT) over fibreglass building blanket and medium duty thermofoil or similar and insulated colorbond sandwich panel (ceiling) consistent with existing Phase 2/3 tunnel building providing a nominal installed noise reduction in the order of 28 dB(A) (Rw34 or greater). ○ Final details of building designs subject to acoustic review prior to final specification ○ Final design/tender specification to be reviewed by an acoustic consultant; • select mechanical plant and equipment to meet acoustic performance and where relevant, sound power levels and/or acoustic performance in Table 10 of the acoustic assessment report for the substrate plant (see below); • require trucks to operate on the access roads at speeds not exceeding 20 kph; • fit "quacker" reversing alarms to mobile plant where practicable; and • incorporate noise management protocols within the environmental management plan for the site.	
Avoid offensive odour	4.5	Design, build, operate and maintain the plant in a manner: • that does not cause offensive odour; • that restricts odour emissions to remain within limits specified in the environment protection licence.	During operation
	4.6	Continue to implement existing odour controls at the plant except where superseded by the modified proposal: • under-cover storage for raw materials to keep them dry; • fully enclosed processing areas for all potentially odour-generating activities; • air-under system in the pre-wet and Phase 1 tunnels to improve aeration of composting material; • automatic control system for fans to maintain optimum air supply and extraction;	During operation

Outcome	Commitment		Timing
		• enclosed conveyor transport for tunnel loading, dispatch loading and transfer to Phase 2/3 tunnels; • a monitoring system to detect any faults or operational anomalies and immediately send an alarm to the Duty Manager at any time of day.	
	4.7	Implement the following additional odour control measures: • construct the approved second emissions treatment plant to a new design incorporating ammonia scrubbers and biofilters, instead of constructing a second bioscrubber and second chimney; • install ductwork to convey extracted air from the current Phase 1 and pre-wet operating areas of the site and deliver it to the new emissions treatment plant; • enclose the raw materials courtyard to contain chicken manure dust and enable controlled air extraction from this area; • install exhaust ductwork from both the existing and future Phase 2/3 buildings; • provide an enclosed conveyor from the pre-wet building to the Phase 1 tunnel building replacing the vehicle passageway to speed up the material transfer process and reduce the potential for fugitive emissions from this operation; • provide controlled air extraction from all external conveyors.	
Effectively manage operational water	4.8	Manage the operation to prevent discharge of process water from the site and to maximise use of collected and recycled water.	During operation
Improve runoff water quality	4.9	Implement and maintain the stormwater modifications recommended in the stormwater management plan , including orifice plates, reed bed and bio-basin.	During construction and operation
Minimise visual impact	4.10	Continue to manage the landscaped areas to ensure the vegetation screen remains effective.	During operation
Protect flora and fauna	4.11	Continue to suppress weeds on the development site and protect remaining trees.	During construction
Monitor and report performance	4.12	Continue to monitor operations and report results as specified in the environment management plan	During operation

Table 10 of the mushroom farm noise assessment report

Table 10: Plant/Equipment Sound Power Levels L_{Aeq} re: 10^{-12} Watts

Plant Description	Sound Power Level								
	dB(A)	**63**	**125**	**250**	**500**	**1k**	**2k**	**4k**	**8k**
Truck (moving)	101	98	102	101	97	94	94	91	80
Truck (idle)	91	88	92	91	87	84	84	81	70
Refrigerated Truck (SB310 refrig. unit)	93	90	94	93	89	86	86	83	72
JCB Telescopic Handler	105	109	99	99	100	101	99	95	93
Nufab Compost Turner	93	93	94	93	90	88	84	80	75
Head Filling Activities (truck engine, filling machine & peat loading)	103	113	107	95	100	94	96	92	85
Cooling Towers x2 (each) (AquaCool MSS 187LS3)	99	91	87	88	90	95	93	87	84
Compressors x 5 (total) (PowerPax TT400)	93	82	82	85	85	89	86	79	83
Steam Generator (ST302l)	99	89	89	94	94	96	93	87	82
Humidification Boiler (Saacke SR1000/PAG10A)	90	104	101	94	85	79	76	72	64
Plant Room (space averaged) [1]	95	84	84	87	87	91	88	81	85
North Air Intake [2]	85	74	74	77	77	81	78	71	75
Roof Air Discharge [2]	85	74	74	77	77	81	78	71	75
AHU Ridge Vents [3]	63	66	62	60	61	59	51	46	40

Note: 1 All fixed plant in purpose designed plant room resulting in space averaged SPL of 95dB(A)
2 Noise attenuation incorporated into plant room to result in source noise level of Lw85dB(A) for intake / discharge
3 AHU would be installed wholly within roof space. Source noise level based on Lw57 at discharge for AHU connected via ducted vents comprising a total of 74 vents, adjusted for 18 ridge top source points. AHU are ducted and could incorporate insulated ducting if required prior to discharge to meet specified limits.

Table 10 of the Substrate plant Noise assessment report

Table 10: External Plant/Equipment Sound Power Levels L_{Aeq} re: 10^{-12} Watts

Plant Description	Sound Power Level								
	dB(A)	**63**	**125**	**250**	**500**	**1k**	**2k**	**4k**	**8k**
Super Chill Condensers EWK-D680 (x6)	83	79	81	81	78	75	73	76	72
Compressor Room (external door) x2	80	79	75	77	76	76	70	69	63
Bioscrubber 2 Fans – each (x2)	107	-	106	104	107	100	98	92	-
Conveyor Drive – New Phase 3 (E-W)	80	72	74	72	77	76	72	63	55
Conveyor Belt – New Phase 3 (E-W)	70*	75	75	70	70	63	59	52	43
Conveyor Drive – New Phase 3 (N-S)	80	72	74	72	77	76	72	63	55
Conveyor Belt – New Phase 3 (N-S)	70*	75	75	70	70	63	59	52	43
Conveyor Drive – Pre Wet	80	72	74	72	77	76	72	63	55
Conveyor Belt – Pre Wet	70*	75	75	70	70	63	59	52	43
FEL – Volvo L90E	102	115	104	100	98	99	92	92	87
FEL – Volvo L150E	105	120	104	103	102	99	97	95	91
FEL – Komatsu WA320	104	114	102	100	102	99	96	93	86
Traymaster Blender	110	109	110	109	108	104	102	99	96
Pre-Wet Shed (average in shed)	85	84	85	84	83	79	77	74	71
Truck (moving)	101	98	102	101	97	94	94	91	80
Loading Activities (Phase 2/3 average in loading hall)	86	81	84	85	85	81	78	73	65
Loading Activities (Phase 2/3 external facade)	63	66	68	63	61	60	49	43	37

* sound power level per metre of conveyor

APPENDIX 2
Substrate Plant Site Layout and Stages

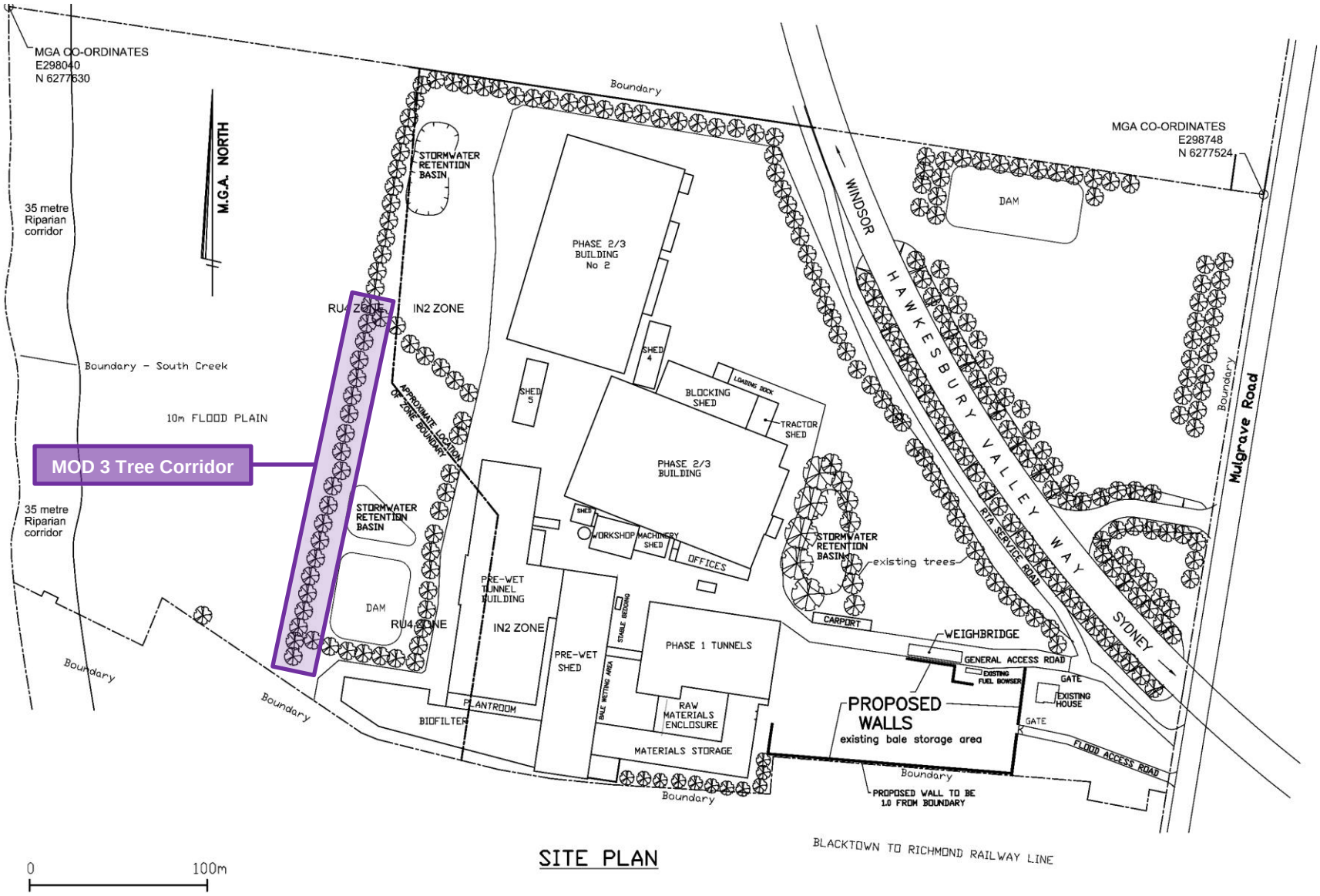

Figure 1: *Substrate plant site layout following MOD 3*

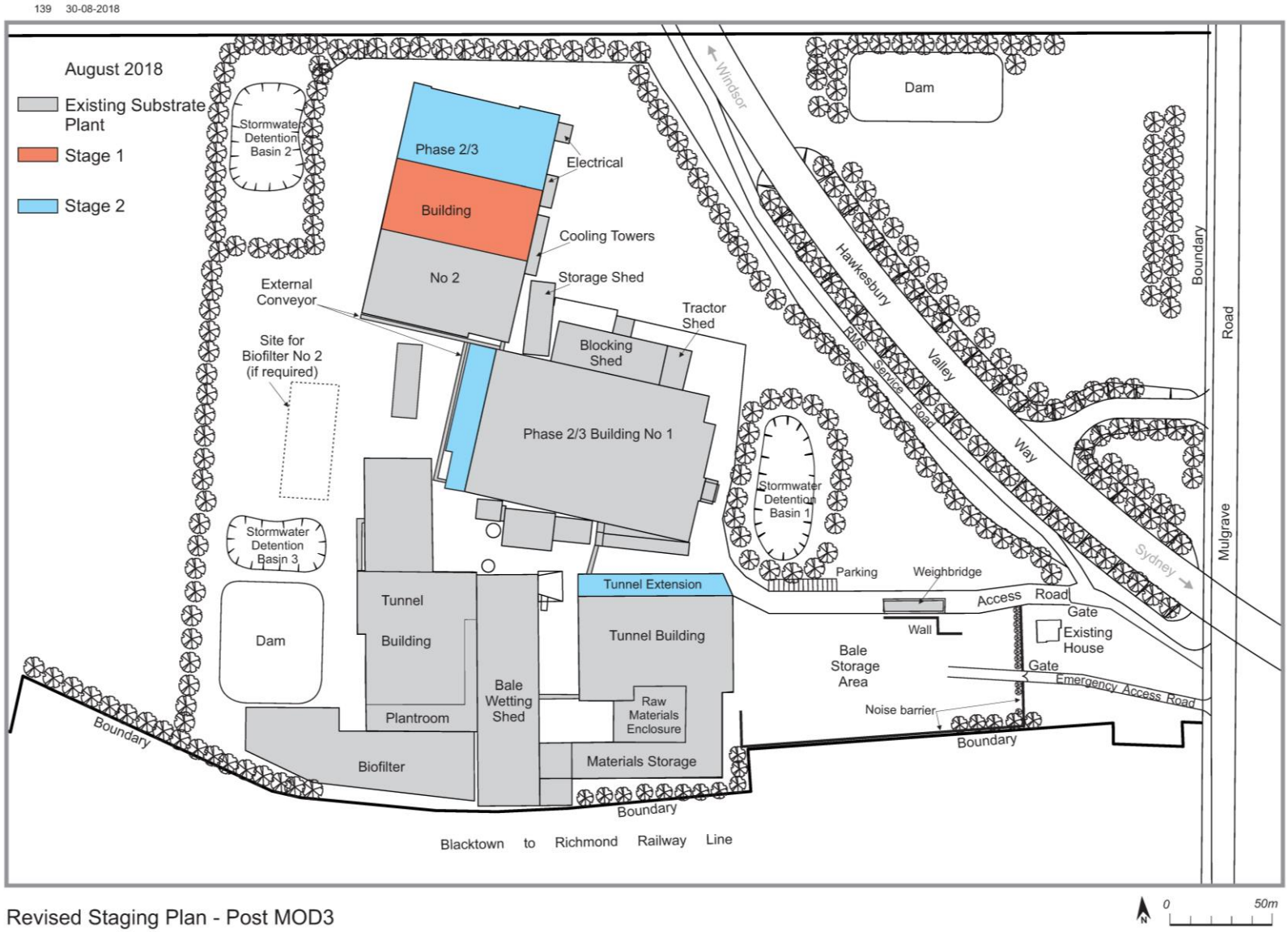

Figure 2: *Substrate plant site staging following MOD 3*

APPENDIX 2A
Substrate Plant Site Stormwater Catchment Plan

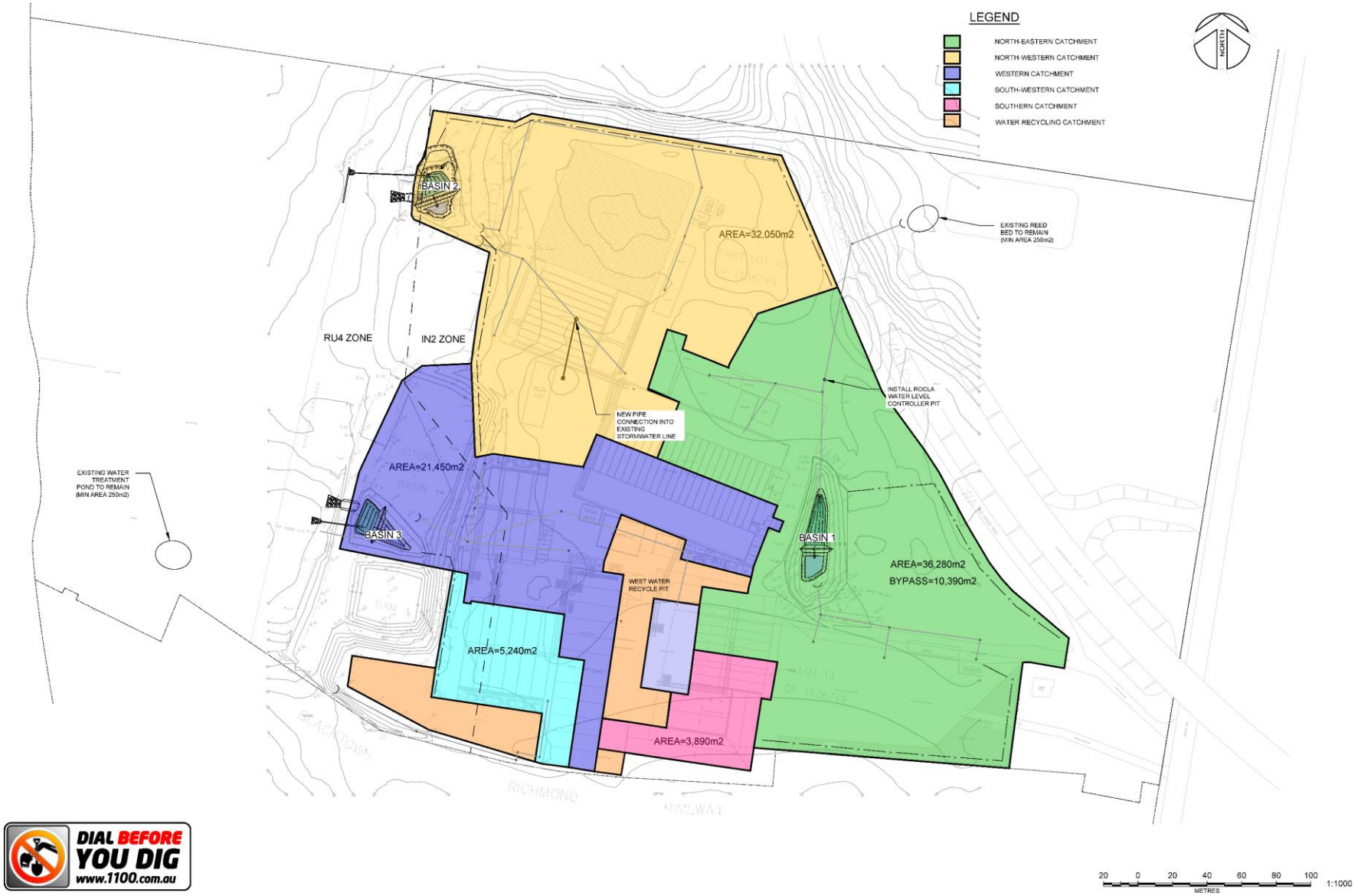

Figure 3: *Substrate plant site stormwater catchment plan following MOD 3*