



Consultant's Design Certification Checklist Wetlands

EXAMPLE FOR CONSULTANT'S OPTIONAL INTERNAL USE
NOT REQUIRED TO BE SENT TO MELBOURNE WATER

Project name and EPMS ref: _____

Subdivision: _____

Municipality: _____

Developer: _____

Consultant: _____

Consultant rep: _____














































Melbourne Water assessor: _____








































Consultant ref: _____


































Melbourne Water ref: _____


























































Melways ref: _____




Date: _____

Sedimentation Pond		Yes	No	N/A	Comments
1	A maintenance access track has been provided to the sediment pond.				
2	The excavator can de-silt the pond from the top of bank (<7m width to centre).				
3	The access track extends to the sediment pond base.				
4	The access track is visually apparent and not confused with pedestrian-only paths and grassed areas.				
5	Maintenance track vehicle access exclusion is provided, e.g. gate, bollard or fence.				
6	A hard base is shown on the design, i.e. rock lined.				
7	The sediment pond has drawdown capabilities.				
8	There is a dry out area or in situ dry out capabilities.				
9	The sediment pond has acceptable batters.				
10	All pipes out letting into the sediment pond have fall protection safety barriers.				
11	A high flow bypass is present.				
12	The sediment pond has a clay liner.				
13	The sediment pond is clear of any boardwalks or viewing platforms.				
14	There is a raised earthen bund rather than a porous rock wall between the macrophyte zone and the sediment pond.				
15	The sediment pond is sized to allow appropriate drop out.				

16	Fencing or dense vegetation is shown around the sediment pond for safety.				
17	An acceptable quantity of sediment ponds has been provided.				
18	An appropriately sized sediment dry out area has been allowed for.				
Wetland Macrophyte (Vegetated) Zone					
		Yes	No	n/a	Comments
1	Vegetated banding is provided perpendicular to the flow path to ensure efficient removal of nutrients.				
2	No pipelines (other than the connection from the sediment pond) discharge into this zone. If there are any, these should be removed unless pre-treatment is provided (all pipe inlets are to be directed into the sedimentation pond).				
3	A minimum of 80% is vegetated (aerial cover at normal water level). The amount of open water in excess of 20% is not to be included in water quality calculations and must be accepted by Melbourne Water.				
4	All batter slopes are at or flatter than 1 in 5.				
5	The planting species, quantity and densities are in line with the Constructed Wetland Design Manual .				
6	The extended detention depth is no greater than 350mm. (For any design proposing greater than 350mm EDD, an inundation frequency analysis is required to verify the design will maintain the longevity of plant species).				
7	The extended detention depth is controlled by a twin function pit.				
8	All rock work and void filling is per the design standards.				
9	All rock chutes are to Melbourne Water standard.				
11	All crossings of the wetland meet either Melbourne Waters constructing waterway crossing guideline or shared pathway guideline (depending				

	which is appropriate) and are indicatively shown on the civil plans. Council has accepted the maintenance of these assets in writing.				
12	Islands are not proposed in the wetland system?				
13	If the wetland is in the base of an RB, has an ANCOLD assessment been accepted by Melbourne Water?				
14	When located in the base of a RB, does the wetland design complement the RB design? (e.g. spillway location, embankment setbacks, outlet configurations)				
15	Jute matting has been included below the 100yr level rather than mulch.				
16	Temporary or permanent fencing has been provided for fall protection or until permanent planting is established.				
17	Provisions for planting bird netting have been made.				
18	An access track is provided around the wetland.				
19	Balance pipes have been provided throughout the wetland.				
Wetland Outlet Arrangements		Yes	No	n/a	Comments
1	The outlet structure (twin function pit) is located on the bank or outside of the wetland to ensure it can be accessed for maintenance tasks and hydraulic manipulation.				
2	The wetland has drawdown capabilities including twin function pit and balance pipes.				
3	The outlet arrangement (pit) enables changes to the hydrologic regime, i.e. the orifice's height and diameter can be changed. This can be in the form of a notch with a removable plate.				
Wetland - General		Yes	No	n/a	Comments

1	The maintenance responsibilities (line of demarcation typically between Council and Melbourne Water) have been agreed upon in writing.				
2	A draft maintenance plan has been developed and reviewed.				
3	All stakeholders (including Council) have accepted the functional design and ongoing maintenance in writing.				
4	The MUSIC and hydraulic modelling has been accepted by Melbourne Water.				
5	The planting plans have been submitted and accepted by River Health.				
6	All flora and fauna, geological and AAV requirements have been met.				
7	Ground water impacts have been considered in the design.				
8	H & S implications have been considered.				
9	All pipe connections are to Melbourne Water standard as per section 1.12 of the Planning and Building website (including outlet velocity).				
10	A SEMP has been created and accepted.				
11	Existing habitat has been retained.				
12	The design caters for fish passage.				
13	The setback from wetland requirements has been met.				
14	The design is unencumbered by any pumps.				
15	Appropriate signage has been shown on the design.				
16	All underground assets/services meet Melbourne Water's cover and offset requirements as per the utility installation guidelines .				
17	Council's written acceptance of any GPTs has been provided.				
18	The design is unencumbered by any fall from height or public safety issues.				
19	All affected land owners have accepted the design and construction in				

	writing.				
20	A draft maintenance agreement has been provided.				
21	The wetland has NWL and TEDD markers.	