

Frequently Asked Questions (FAQ) for Aerosol Generating Systems (AGS) Registration and Submission of Water Quality Test Results

AGS Registration

1. What are the types of AGS to be registered?

Operational Cooling Towers (CTs) are required to be registered as types of AGS. The registration of these CTs will facilitate traceability in the event of a water-borne disease outbreak.

2. Can owners/occupiers register more than one CT in a single application?

In a single application, up to 5 CTs located within the same premises using the same postal code can be registered.

3. Whose CorpPass account should be used for registration?

CorpPass accounts of owners/occupiers are to be used for registration.

4. Which service from NEA should the company's CorpPass admin grant access to the staff doing the registration of AGS?

Your company's CorpPass administrator needs to grant access to 'NEA E-SERVICES' to the staff doing the registration of AGS.

5. Will there be a fee for registration of AGS?

There will be a one-time registration fees of \$70 per CT system and no GST will be incurred. One CT system consists of one or more cells sharing one common basin.

6. Who is responsible to ensure that the CTs are registered, and water quality results are submitted on time?

Owners/occupiers of the premises where the CTs are installed, are responsible for the registration and submission of the water quality results, even if they are outsourced to a contractor.

7. If owners/occupiers have previously registered their CT(s) through submission of a manual form in Appendix A of Code of Practice for the Control of *Legionella* Bacteria in Cooling Towers, do they still need to register these CTs again in ePortal and pay the registration fee?

Owners/occupiers who have previously registered manually are still required to re-register their company's CT(s) through the NEA ePortal, and the registration fees will apply.

8. May I have the illustration of various configurations of CT systems?

The illustrations of various configurations of CT systems can be found in the Appendix 1 of FAQ.

9. Can 2 or more CT basins connected by equalising/balancing piping or common pump suction header be considered as 1 CT system, i.e. which requires only 1 registration?

When 2 or more CT basins are connected by equalising/balancing piping or common pump suction header with separate basins, they are separate CT systems as different basins might have different

water quality due to differing conditions of each basin (e.g. tendency of microbial growth/biofilm accumulation, scaling and corrosion condition).

10. What is the validity period of a registration?

The registration of any CT shall remain valid unless under the following scenarios in the table below:

S/N	Scenario	What do owners/occupiers need to do?
1	Change of ownership of the premises where CTs are installed	<ul style="list-style-type: none"> The outgoing owners/occupiers are required to de-register their CTs in NEA ePortal. The new owners/occupiers are required to register these CTs in NEA ePortal.
2	Change of location (postal code) of the premises where CTs are installed	<ul style="list-style-type: none"> The existing owners/occupiers are required to de-register their CTs in NEA ePortal. The existing owners/occupiers are required to register these CTs, using the new postal code, in NEA ePortal.
3	Replacement of CT	<ul style="list-style-type: none"> The existing owners/occupiers are required to de-register their CTs in NEA ePortal. The existing owners/occupiers are required to register these CTs in NEA ePortal.

For de-registration in ePortal, owners/occupiers will not be able to de-register individual CT if more than one CT are registered under the same submission ID/application number. Owners/occupiers are advised to approach NEA to de-register one or some of the CTs registered previously under the same submission ID/application number.

11. Who should be the person in charge (PIC) in the registration form?

Person in charge (PIC) is a person assigned by the company to coordinate day-to-day running of CT operations. (e.g. from facility management).

12. What is the schematic diagram and how do I submit into the registration?

The schematic diagram shows the connectivity between different components of the CT system to illustrate the number of CTs declared. If the schematic diagram cannot be found, you may wish to draw the layout (not to scale is accepted) or adopt the simple drawing in Appendix 1 of our circular. The upload of schematic diagram is a necessary field for the registration of CT in NEA ePortal.

13. Can owners/occupiers amend their registration details in ePortal?

Owners/occupiers can amend all fields, except for the following fields: 'postal code', 'organisation name' and 'UEN' of CT and CorpPass details. For these fields, the owners/occupiers are required to de-register the CT in NEA ePortal and re-register the CT in NEA ePortal, using the updated information. For amenable fields, use NEA-ID to retrieve the CT's registration detail and amend accordingly.

14. If my registered CT is shut down temporarily for more than 5 consecutive days, what should I do?

If your registered CT is shut down for more than 5 consecutive days, you will need to log in to ePortal with the NEA ID of the affected CT and select the option 'Temporary Shutdown' in the Submission category of AGS Registration to notify NEA on the period of shut down.

15. What do owners/occupiers need to do if their registered CT is permanently shut down or demolished?

The owners/occupiers are required to de-register their CT in NEA ePortal. For de-registration in ePortal, owners/occupiers will not be able to de-register individual CT if more than one CT are registered under the same submission ID/application number. Owners/occupiers are advised to approach NEA to de-register one or some of the CT registered previously under the same submission ID/application number.

16. What is an NEA ID and what do we do with the NEA ID?

NEA ID is the alphanumeric ID (i.e. NEACT2X00XXXX) assigned by NEA and issued to your company's CT. NEA IDs will be emailed to you via system after successful registration of CT. The NEA ID will be required to be physically labelled on the CT clearly in a conspicuous position. NEA ID will also be required for the submission of laboratory results.

Submission of Water Quality Test Results for AGS

17. When will owners/occupiers be required to start submitting the water quality test results in NEA ePortal, after registering their CTs?

After registering CT, submission of HPC and LBC water quality test results should start:

- a. Heterotrophic Plate Count (HPC) for the following month, after registering their CTs; and
- b. *Legionella* Bacteria Count (LBC) within the following 3 months, after registering their CTs

Example: CT Owner A registered their new CT in October 2022. Within the subsequent three months (i.e., October-November-December), the owner shall arrange for their quarterly test in **December 2022**. Test result for December 2022 must be submitted **no later than 14 January 2023**.

18. When is the deadline to submit water quality test results?

The water quality lab results for CTs, for samples collected and tested in a particular month shall be submitted no later than 14th of the following month.

19. Whose CorpPass account should be used to submit the water quality test results for CTs?

The CorpPass accounts of either owners/occupiers or SAC accredited laboratories engaged by the owners/occupiers, are to be used for test result submissions. The list of SAC accredited laboratories can be found at <https://www.sac-accreditations.gov.sg/Pages/Homepage.aspx>.

20. Will there be a fee for submission of water quality test results for CTs?

There is no fee for submission of water quality test results for CTs.

21. Can more than one test result be submitted in a single submission?

A standard excel template through bulk upload function in the NEA ePortal can be used to submit more than one test result. This excel bulk-upload template is retrievable from the NEA AGS webpage (<https://www.nea.gov.sg/our-services/pollution-control/water-quality/aerosol-generating-systems>).

22. What happen if failed water quality test results are submitted?

If the CT does not comply with the requirement limits for water quality, the owners/occupiers may take the following steps:

- i. Disinfect CT as soon as practicable within 3 days after date of failed test result;
- ii. Do another round of water quality sampling within 24 hours after disinfection and ensure that the water quality complies with the regulated limits; and
- iii. Submit the test results to NEA via NEA ePortal within 7 days after completion of test (date of test results).

23. Will NEA take enforcement actions for late submission of water quality test results?

NEA will take enforcement action for test results of a particular month submitted after 14th day of the following month.

24. Where do we collect water samples for CTs with completely partitioned basins?

Water samples for CTs with completely partitioned basin can be collected from the drain pipe of each CT.

25. Why do we collect water samples for CT from the basin, and not from the drain pipe?

The water of CT should be collected where the circulated water is and the basin is one of the common places where water is collected. Some CTs have dedicated sampling port along the return pipe (where water is leaving CT returning to dosing system). Since not all CTs in Singapore have such sampling port, thus it has been standardised to collect the water sample from the CT basin.

26. If there is only 1 failed parameter in water quality test results of a CT, does owner need to re-test both required routine parameters or re-test the failed parameter only?

If one or more water quality test parameters were found not to comply with regulatory limits, owner should thoroughly clean and disinfect the CT and re-test both required routine test parameters as the water quality may not be the same as of the last test.

27. Can laboratory test result submission reminders be sent to the laboratory engaged by the owners as well?

Laboratory test result submission reminders are sent to owners as they are responsible to ensure that their engaged laboratories submit the lab test results to NEA at the stipulated frequency.

28. Are we able to view the submission status if the test result is submitted by the laboratory engaged by my company?

Only the CorpPass account that is used for laboratory result submission can view the submission status. E.g. If the lab's CorpPass account is used to submit the lab results, only the lab's CorpPass account can be used to view details of the submission status in ePortal.

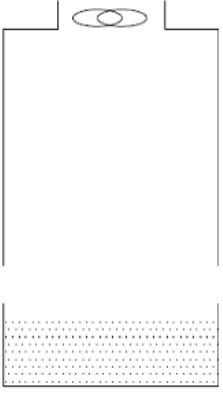
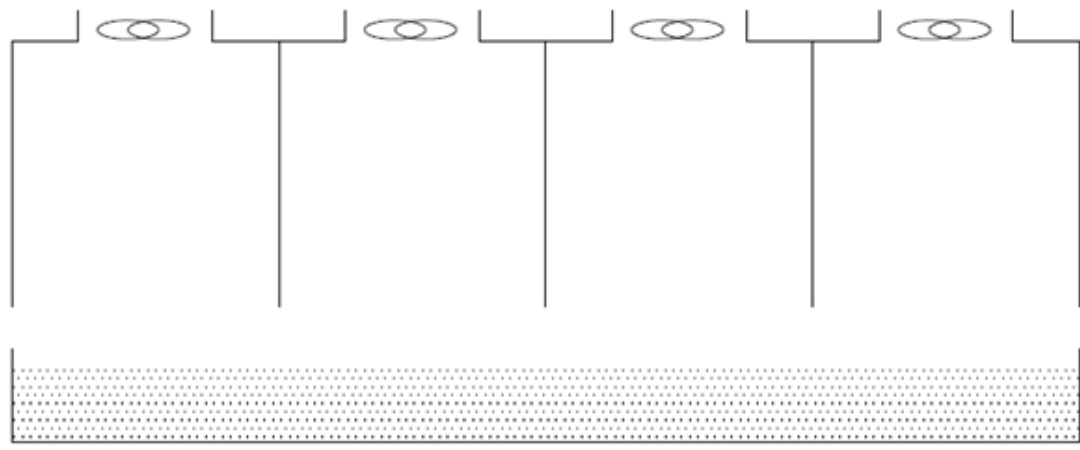
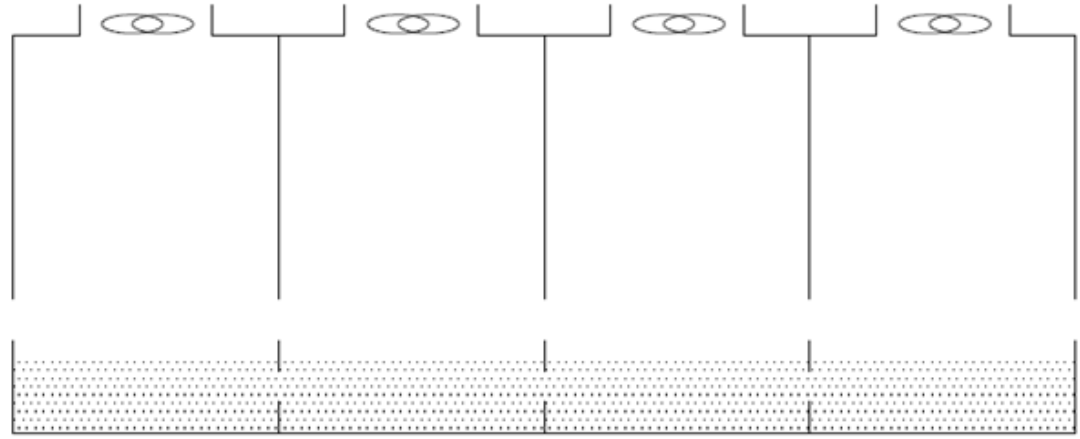
29. If there is only 1 failed parameter in water quality test result in an aerosol generating system, does the registrant need to re-test both required routine parameters or re-test the failed parameter only?

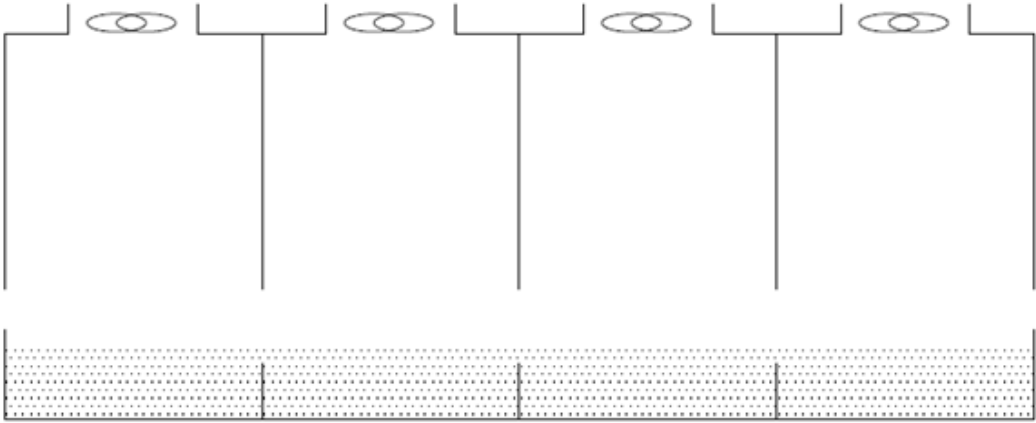
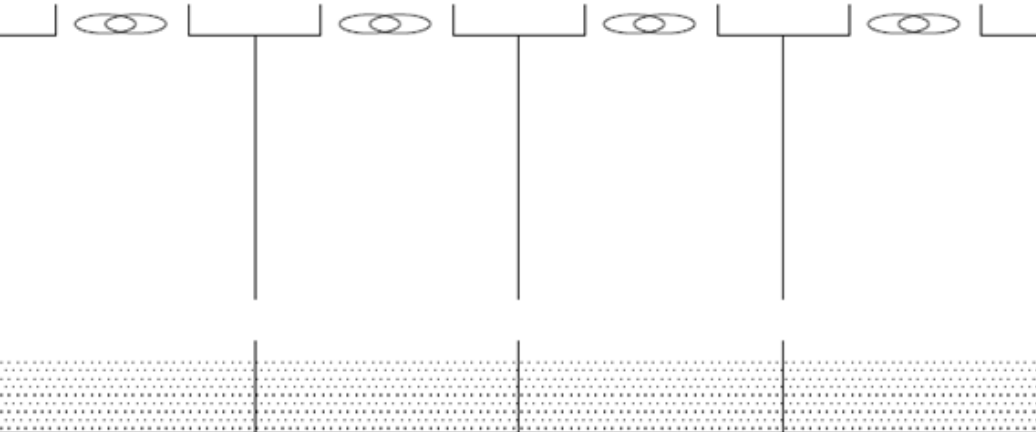
If one or more water quality test parameters were found not to comply with regulatory limits, registrant should thoroughly clean and disinfect the aerosol generating system and re-test all the required routine test parameters as the water quality may not be the same as of the last test.

30. Since siting requirements for CTs are in COPEH now, what will happen to the Code of Practice for Control of *Legionella* in Cooling Towers ("COP") and does QP still need to comply with it for CTs at building plan stage?

The Code of Practice for The Control of *Legionella* Bacteria In Cooling Towers ("COP"), covers CT design, servicing, maintenance, monitoring of cooling system and workers' safety during servicing and maintenance. The design components in COP (siting requirements) are transferred to COPEH under Section 4 Cooling Tower.

Appendix 1: Illustrations of Various Configurations of Cooling Tower (CT) Systems

S/N	Various Configurations
1	<p>Configuration: 1 cell with 1 basin NEA's assessment: 1 CT system (1 registration required)</p> 
2	<p>Configuration: 4 cells sharing 1 common basin NEA's assessment: 1 CT system (1 registration required)</p> 
3	<p>Configuration: 4 cells with partially partitioned basins (water can pass through partition from 1 basin to another basin) NEA's assessment: 1 CT system (1 registration required)</p> 

4	<p>Configuration: 4 cells with partially partitioned basins (water can flow over partition from one basin to another basin) NEA's assessment: 1 CT system (1 registration required)</p>  <p>The diagram shows a rectangular container divided into four equal-sized basins by vertical partitions. Each basin has a circular opening at the top, centered on the partition. The openings are aligned horizontally across all four basins. The bottom of the container is a single continuous surface, indicated by a dashed line. This configuration allows water to flow over the top of the partitions from one basin to another.</p>
5	<p>Configuration: 4 cells with completely partitioned basins (water cannot flow through or over partition from one basin to another basin) NEA's assessment: 4 CT systems (4 registrations required)</p>  <p>The diagram shows a rectangular container divided into four equal-sized basins by vertical partitions. Each basin has a circular opening at the top, centered on the partition. The openings are aligned horizontally across all four basins. The bottom of the container is divided into four separate sections by vertical lines, indicated by a dashed line. This configuration prevents water from flowing through or over the partitions, requiring separate CT systems for each basin.</p>