

Working Group on air change or air purifiers in catering premises holds meeting in view of latest epidemic developments

The Secretary for Food and Health stipulated in March last year a requirement on air change or air purifiers to be complied with by dine-in catering premises in the directions in relation to the catering business under the Prevention and Control of Disease (Requirements and Directions) (Business and Premises) Regulation (Cap. 599F). The Working Group established for the smooth implementation of the requirement held an online meeting yesterday evening (May 20) in view of clusters of infection cases at restaurants recently. The Chairman of the Working Group, expert members and representatives from government departments were briefed by two departments on the respective inspection findings of implementation of air change and air purifiers, and discussed the latest epidemic developments and offered views on anti-epidemic strategies.

According to the announcement of the Government, the local epidemic situation has been stable for a period of time, with the number of confirmed cases staying at the level of 200 to 300 daily. As the risks are under control, the second stage of the relaxation in social distancing measures commenced from May 19. In view of the public's earnest expectations for the resumption of social and economic activities in a gradual and ordered manner, the Working Group reminded all catering business operators to ensure that the operations of their ventilation systems and air purifiers in their premises are in optimal and proper conditions, which will be conducive to stabilising the epidemic.

The items discussed by the Working Group at the meeting included:

- (a) examining the recent clusters of infection cases related to restaurants, including hitherto the cumulative number of confirmed cases dining at the material time at the respective restaurants, and known information on their air change and air purifiers;
- (b) reporting by the representatives of the Electrical and Mechanical Services Department (EMSD) on the findings on air change data gathered and analysed from the operation of the ventilation systems of 55 restaurants (as samples), selected from some 2 000 restaurants registered to have met the requirement of air change per hour (ACH) at six or above with no air purifiers installed, over the past few months. It was revealed that 11 restaurants could improve their ventilation situations through simple cleansing, maintenance or repair work. Such information can facilitate the formulation of recommendations on follow up measures that could be adopted by restaurants (as population) in future;
- (c) reporting by the Food and Environmental Hygiene Department (FEHD) that, leaving aside some 2 000 restaurants above-mentioned (i.e. restaurants with

no air purifiers installed) and over 1 400 restaurants closed for business, the FEHD inspected all the remaining 14 700 some restaurants registered with the installation of air purifiers, and cross-checked on-site the brand, model and number of over 30 600 air purifiers against the data recorded in the certificates registered, recorded their positions on layout plans, conducted checking on whether the devices were switched on, operated, maintained and other issues (such as display of notices on air change), over the past few months; and

(d) exploring measures on air change and air purifiers that could be followed up by catering premises operators in the near future, so as to get themselves better prepared for the third stage of the relaxation in social distancing measures, and putting forward some observations and advice after analysing the information known at this stage.

Representatives of the EMSD advised at the meeting that all catering premises operators should pay special attention to the following, in view of the findings on the problems on operating the ventilation systems by individual restaurants during its inspection:

(a) catering staff should get themselves conversant with basic knowledge and understanding on the design and operation of the ventilation systems. Apart from switching on and using the systems, they must also ensure that these are functioning well, with sufficient supply and, as far as practicable, even distribution of fresh air supply;

(b) apart from regular and proper maintenance and repairs, must pay attention to whether or not the systems and mechanics are out of order or they are functioning well, such as weakened air outlets, abnormal sounds or vibration, illuminated warning light, and more;

(c) regular cleansing of the ventilation systems (including air outlets/louvers and air ducts) and/or replacement of dust filters, so as to maintain air flow and air quality; and

(d) all restaurants (especially large restaurants) must pay attention to the distribution of fresh air supply of the ventilation systems to ensure that sufficient fresh air supply is available at different positions of the restaurant. For the restaurants inside large shopping malls, the fresh air supply may be provided by the air ventilation systems of the malls, premises operators must observe if the fresh air supply is sufficient and, as necessary, ask the management of the shopping malls to take measurement and make adjustment.

During its inspections, the FEHD also reminded premises operators to properly maintain and repair the fresh air supply systems approved under the restaurant licences, and to switch on the systems when premises are opened for business, so that the supply of outside air functions normally. They are also reminded to comply with the requirements under Cap. 599F to switch on and operate the ventilation systems and air purifiers (if installed) when the premises are opened for business, and regularly maintain and repair the facilities properly.

According to the requirements under Cap. 599F, catering premises which have yet to register via the designated FEHD webpage on compliance with a minimum of six ACH or installation of air purifiers meeting the prescribed

specifications by February 24 this year are required to remain closed until such registration has been completed and confirmation from the FEHD as valid has been obtained.

Since the requirement on ventilation under the directions of Cap. 599F came into force on March 18, 2021, the FEHD has initiated procedures on prosecutions against 51 cases violating this requirement (including five cases which are opened for business without relevant registrations after February 24).

The Working Group would also like to remind operators of catering premises through the FEHD that at all times when their premises are in operation, apart from complying with the ventilation requirement pursuant to the directions made under Cap. 599F, they must at the same time comply with the requirement under the Public Health and Municipal Services Ordinance (Cap. 132) that the licensed premises must be provided with a ventilating system that will provide for each person accommodated in the premises an amount of outside air of not less than 17 cubic metres per hour per person. In other words, even if air purifiers have been installed, the catering premises operators must still switch on and properly operate its fresh air supply systems at all times. They should also remind their catering staff of the necessity of switching on and proper operation of the ventilation systems when their premises are opened for business, as well as to maintain and repair the concerned systems in order to ensure the fulfilment of the above-mentioned requirements on outside air supply.

As regards air purifiers, the FEHD has issued letters to catering business operators for multiple times to remind them to properly switch on, operate, maintain and repair the air purifiers in accordance with the manufacturer's manual when the premises are opened for business. The Working Group reiterated that in light of most of the air purifiers having been used for a period of time, HEPA air purifiers must be regularly maintained as per the manufacturer's instructions, and HEPA filter must be regularly replaced according to the intervals recommended by the manufacturer; whereas for UV-C air purifiers, one must regularly maintain the devices as per the manufacturer's instructions, and, after having the UV-C lights switched off, clean the shields using proper tools and remove the dust inside the devices.

The Chairman of the Working Group, Professor Yuen Pak-leung, said, "Apart from sufficient outside air supply, the air volume of the ventilation system has to be evenly distributed within seating areas and individual compartments as far as practicable. Air purifiers should also be installed in a position that could effectively cover the areas occupied by users. Moreover, tables should not be arranged near dead corners of the restaurant. Air mixing through air movement so as to achieve dilution and cleansing effect could mitigate the stagnant air problem in dead corners."

"Operators of the catering premises must stay vigilant about the operation of ventilation systems. In case clusters of infection cases emerge, the restaurants may risk tarnishing their reputation and losing their customers. Operators are required to review the ventilation systems of the premises to ensure their proper operation, sufficient fresh air supply and

even coverage of all areas. If necessary, they should seek assistance from professionals, such as registered specialist contractor (ventilation works category) (ventilation contractors)," Professor Yuen continued.

The Working Group and the government departments will continue to keep in view the local epidemic development and international discussions on ventilation standards and examine whether recommendations of adjustment are needed. The Working Group reiterates its calls for the catering sector, other sectors and members of the public to continue to comply with the relevant regulations on prevention and control of disease in a concerted and persistent manner to protect personal and public health. In addition, as vaccination is a very crucial part of the local anti-epidemic strategy, the Working Group also encourages the public who have not yet received vaccination to get vaccinated as early as possible for better health protection of their own as well as the public.