



## STANDARD OPERATING PROCEDURE

### AIR CONDITIONING & TM44

#### *Governing standards and regulations:*

- The Fluorinated Greenhouse Gases Regulations 2015
- Energy Performance of Buildings (Certificates and Inspections) (England and Wales) Regulations 2007 and Amendments
- Energy Performance of Buildings (England and Wales) Regulations 2012 and Amendments
- CIBSE TM44: 2012 Inspection of air conditioning systems
- Fluorinated gas (F gas): guidance for users, producers and traders

**SOP Number 016**

**SOP Title Air Conditioning & TM44**

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## Acronyms:

BS: British Standard

CPT: Corporate Property Team

FM: Facilities Management

HSE: Health & Safety Executive

NCC: Norfolk County Council

SOP: Standard Operating Procedure.

UK: United Kingdom

## 1. PURPOSE & SCOPE

Air Conditioning Equipment includes All Mechanical equipment, Ductwork, Compressors, Pipework, Electrical parts as well as anything associated with the installation, repair, and maintenance of these systems. The repair, maintenance and installation of these Systems should be limited to those who have been trained and are qualified to do so. This Standard Operating Procedure (SOP) will set out how we will ensure that when these pieces of equipment are present, they are in an operable condition, safe to use and any possible issues are, as best as possible, negated. This can be achieved by way of good regular maintenance and regular inspections, daily, monthly, and annually. As well as ensuring the equipment meets United Kingdom (UK) standards and any regulations related in UK law. Air conditioning systems with an expected output of greater than 12kW fall under The Energy Performance of Buildings (England and Wales) Regulations 2012 Part 4, (External Reference 1). Where a system has an expected output of greater than 12kW and uses refrigerant, this must comply to have a TM44 Assessment, (External Reference 2).

The purpose of this SOP is to establish clear and comprehensive guidelines for the inspection, maintenance, and repair of Air Conditioning Equipment in commercial and domestic buildings managed by Norfolk County Council (NCC) Corporate Property team (CPT). It ensures compliance with UK and Health and Safety Executive (HSE) regulations, detailing the frequency and procedures for these tasks. By following this SOP, we aim to maintain fully functional and reliable Air Conditioning Equipment, thereby ensuring the safety and well-being of building occupants.

## 2. RESPONSIBILITIES

### 2.1 Responsible or Accountable Person

The owner or person in control of the premises is the responsible person. The responsible person is defined as **Norfolk County Council** for the purpose of this SOP. The duties of the responsible person can be delegated, however, ultimately the responsible person, NCC, will remain accountable.

### 2.2 Responsibility by Proxy

The Responsible person, NCC, can appoint one or more competent persons to assist in undertaking the preventative and protective measures. A competent person is defined as someone with sufficient training, knowledge, and



experience. This will be determined and recorded by NCC CPT using the NCC training log. NCC CPT FM Operations Managers assigned to a specific portfolio in collaboration with the appointed Premises Manager for the individual properties and or portfolios will undertake duties to assist the responsible person.

### **3. OPERATIONAL PROCEDURE & ACTIVITIES**

#### **3.1 Air Conditioning System Installation & Setup**

The NCC CPT FM Operations Manager will ensure that a suitably trained, qualified, and competent engineer is appointed to tasks related to the installation and setup of said equipment. This will be achieved using the Appointed Supplier Database (Internal Reference 1).

The NCC CPT FM Operations Manager will instruct a suitably qualified supplier to design, deliver, and install required items to site to conform with all regulations. Suitably qualified is deemed as registered with F-Gas Register or similar governing body as defined in the UK government guidance, Company certification to work with F gas.

The NCC CPT FM Operations Manager will liaise with the Premises Manager to ensure an asset list is created. The NCC CPT FM Operations Manager is ultimately responsible for ensuring all asset lists are kept up to date.

The Asset list will be used by the premises manager to complete any daily, weekly or monthly visual inspections as set out in NCC's Premises Manager Handbook, (Internal Reference 2). This is a premises manager obligation the NCC CPT FM Operations Manager is there only to monitor completion, assist, and store all the information on the CAFM System.

The specification of equipment will be communicated to the NCC CPT FM Operations Manager by the Installer, and each item will be listed with its F-Gas expected use in Kg's and all other relevant information so that an F-Gas register can be produced as per *The Fluorinated gas (F gas): guidance for users, producers and traders*.

#### **3.2 Air Conditioning System Service & Inspection Schedule**

Once the Air Conditioning equipment has been installed as set out in Section 3.1, the NCC CPT FM Operations Managers will arrange service and inspections as detailed in Table 1 starting from the installation date. To comply with the Fluorinated Greenhouse Gases Regulations 2015 (External Reference 3), the frequency of all inspections is determined by the quantity of refrigerant used in the system in CO2 equivalent.

These service and inspections can be brought forward to reduce cost, such as in line with other sites but cannot be put back to ensure the system will not be out of date.



The compliance checks to be arranged are:

Scheduled Task	When applicable	Task ID	Frequency
F-Gas Inspections (500 000 Kg CO2 equiv.)	See Task Name	Not setup currently as no assets	3 Monthly
F-Gas Inspections (50 000 Kg CO2 equiv.)	See Task Name	NCC-TASK-02-10	6 Monthly
F-Gas Inspections (5 000 Kg CO2 equiv.)	See Task Name	NCC-TASK-02-11	Annual

*Table 1 : Inspection schedule*

NCC CPT will adopt this schedule for all service and inspections of Air Conditioning Systems. The NCC CPT FM Operations Manager will set this schedule up on the CAFM System using the Asset Naming Convention document (Internal Reference 3) to set the asset and the scheduled tasks as per CAFM System requirements.

### 3.3 TM44 Assessments

Where an Air Conditioning System uses Refrigerants (F-Gas) and the expected output, identified when installed or maintained, is greater than 12kW a TM44 Assessment is required. This must be completed every 5 years and by an independent assessor accredited to the CIBSE or similar. This means someone who is not the installer, owner, or operator of the installation. This will be scheduled on the CAFM System 5 years from the installation date. The NCC CPT FM Operations Managers will use the Naming Convention document (Internal Reference 3) to set the task and asset up on the CAFM System.

Scheduled Task	When applicable	Task ID	Frequency
TM44 Legislation Surveys	Any system above 12kW	NCC-TASK-02-12	5 Yearly

### 3.4 Air Conditioning System Reactive/Remedial Works

If, during any visual inspection or Annual Service & Inspection, any defect is found the article in question will be identified and repair shall be scheduled. The repair will be achieved through the CAFM reporting system by raising a Follow-on Work Order.



Once the defect has been raised either by Premises Manager, Inspection engineer or NCC CPT FM Operations manager through the helpdesk or direct on the CAFM System and a work order raised, the NCC CPT FM Operations manager or Admin will instruct a suitable repairer to carry out maintenance. This may be the same as the installer.

The NCC CPT FM Operations Manager will select the supplier from the Appointed Supplier Database (Internal Reference 1) and will update the work ticket on the CAFM System.

### 3.5 Other Considerations

If there should be a leak of Refrigerant into the environment the NCC CPT FM Operations Manager must report the leak as an environmental incident to NCC Health and Safety team.

The NCC CPT FM Operations Manager will follow all instructions given by NCC Health and Safety once reported, and all communications and steps taken will be recorded on the CAFM System.

## 4. FORMS/TEMPLATES TO BE USED

Asset Naming Convention to be used for all assets and scheduled tasks on the CAFM System.

## 5. INTERNAL AND EXTERNAL REFERENCES

### 5.1 Internal Resource References

1. Appointed Supplier Database
2. Norfolk County Council – Premises Manager Handbook
3. Asset Naming Convention

### 5.2 External Resource References

1. The Energy Performance of Buildings (England and Wales) Regulations 2012 Part 4
2. CIBSE TM44 Assessment
3. Fluorinated Greenhouse Gases Regulations 2015

## 6. CHANGE HISTORY

Should this SOP require alterations of any kind, they must be recorded as follows:

- **SOP Number:** The current SOP and new version number.
- **Effective Date:** The date the updated SOP becomes effective.
- **Changes:** A brief description of the main changes from the previous version.



- **Previous SOP Number:** The previous SOP and version number.

SOP no.	Effective Date	Changes	Previous SOP no.
016	01/12/24	Rebranding to NCC specifications	114