

Tactical Fire Plans and 'As-Installed' Drawings

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1. PURPOSE

This guideline has been developed to assist industry in the production of tactical fire plans and 'as-installed' drawings for the purposes of:

- establishing a standardised format for tactical fire plans, that will assist the onsite fire fighting crews to quickly identify the major fire safety features of the building during an emergency
- to do away with the need to provide detailed design drawings within Fire Control Rooms (FCR) or at the Fire Control Centres (FCC)
- to ensure that the requirements for tactical fire plans and 'as-installed' drawings are standard and consistent.

2. SCOPE

The application of this guideline relates to all buildings constructed within the Fire Rescue Victoria (FRV) fire district that:

- contain a FCR or a FCC
- are served by active fire protection systems that are required to be identified on tactical fire plans or 'as-installed' drawings
- where the Fire Rescue Commissioner requests that the design is of an unusual nature.

3. WHAT ARE TACTICAL FIRE PLANS AND 'AS-INSTALLED DRAWINGS'?

Tactical fire plans and 'as-installed' drawings are basic building floor plans showing locations of fire safety equipment. These plans are in the form of schematic drawings, colour coded, colour fast, protected against physical damage, and prepared for use by FRV during an emergency. Reflected ceiling plans are not suitable for this purpose.

4. BACKGROUND

4.1 TACTICAL FIRE PLANS

Within Clause E1.8 of the NCC, it stipulates that the following buildings require a FCR or an FCC (and hence tactical fire plans):

- all buildings with an effective height exceeding 50m
- all Class 6, 7, 8 or 9 buildings with a total floor area exceeding 18,000m²
- where the FRV Fire Safety Department requires.

4.2 'AS-INSTALLED' DRAWING LOCATIONS

Section 7.2 of AS 1670.1 – *Fire detection, warning, control and intercom systems—System design, installation and commissioning* requires 'as-installed' drawings to be housed in, or adjacent to, FIPs.

4.3 REPORT AND CONSENT REQUIRED

FCR, FCC and FIPs are prescribed fire safety matters within the meaning of Regulation 129 of the Building Regulations 2018, and as such, require the Fire Rescue Commissioner's report and consent in relation to an application for a building permit application, where they do not meet the deemed-to-satisfy provisions of the BCA.

Note: *tactical fire plans/site layout drawings may also be required for some premises in which dangerous goods are stored. These plans/drawings shall be placed within the manifest if one is required by the Dangerous Goods Regulations. If no manifest is required, the plans/drawings shall be located in the Fire Control Centre.*

5. GENERAL PROVISIONS

The drawings should be uncomplicated but sufficiently detailed to include important aspects of fire safety. All superfluous information or measurements are to be excluded from the drawings. An acceptable scale of 1:100 or 1:200 (even 1:500 in the case of buildings with large floor areas) should be provided after consultation with FRV's BCA and Audits Department.

The fundamental objective is to provide enough detail to enable firefighters to discern the obvious features in the building, particularly fire fighting equipment, egress, core areas, etc. Tenancy particulars are not to be included since they are generally subject to variation during the life of the building. The drawings should be suitably protected so that they remain legible and do not deteriorate or suffer from damage. They should also be stored within suitable plan draws or on a 'hang-a-plan' facility.

6. TACTICAL FIRE PLAN REQUIREMENTS

FRV recommends the following colour coding be used

Fire Protection Features (Active/Passive)	Hydrant / Hose Reel	Red
	Booster Connections	Red
	Isolating / Control Valves	Red
	Hydrant /Sprinkler Pumps	Red
	Emergency Telephone Points / Panel	Red
	Smoke / Thermal Detectors	Red
	Extinguishers	Decal
	Gaseous Suppression Systems	Hatched Green
	Fire Indicator Panel	Hatched Pink
	Static Water Storage	Double Hatched Red
	Fire Control Room	Red
	Fire Wall / Compartments	Hatched Red
	Fire Fan Control Panel	Hatched Pink
	E.W.I.S Panel	Hatched Pink

Where fire hydrant and fire hose reel cupboards contain additional equipment (e.g. emergency telephone points, emergency warning and intercommunication system equipment, etc.) which cannot be clearly indicated within the confines of the cupboard, several options exist:

- each cupboard may be coloured red and all the contents clearly listed
- the cupboard may be magnified on the drawings to individually identify the items contained within
- the use of decals that individually identify the equipment within the cupboard may be preferred.

Egress <i>Note: Fire and smoke doors to be indicated</i>	Fire isolated stairways, ramps and passageways	Green
	Pressurised stairways, ramps and passageways	Hatched Green

Note: The colour coding identifies the exits required by regulation only. All other stairways, exits and entrances will be shown as part of the building outline.

Air Handling Systems	Supply Air Shaft / Duct	Blue
	Smoke Exhaust Shaft / Duct	Orange
	Fire Dampers	Red

Note: *Distribution ducts throughout floor areas will unnecessarily complicate drawings and should not be included. In buildings where detectors are located in ductwork, a section of the duct, together with its location, should be included so that identification of the detector is possible.*

Electrical	Switch Room	Yellow with diagonal black stripe
	Substation / Transformer	Yellow
	Standby Power Equipment	Yellow
	Electrical Risers & Cupboards	Yellow
Miscellaneous	Gas Controls	Brown
	Fuel Tanks & Controls	Purple
	Special Risk Areas (e.g. Laboratories)	Dashed Red Line

7. PROCEDURE

It is recommended that discussions with regards to the development of tactical fire plans are initiated as soon as practical in the building design process. The use of systems such as Computer Aided Design (CAD) software to produce these plans will simplify the process, particularly as alterations occur.

If the drawings become congested, it is recommended that the size of the drawings be increased to a more appropriate scale. If this is not possible, then it is suggested that consultation with FRV's BCA and Audits Department be made to resolve the issues.

On completion of final drawings and before lamination, a final viewing should be arranged with FRV's BCA and Audits Department to ensure the satisfactory resolution of all issues. Upon final approval, the drawings will be stamped and signed by the approving officer.

Note: the implementation of this guideline generally requires FRV endorsement. Where any variations are proposed, they need to be negotiated with FRV's Fire Safety Department.

Note: *this is a controlled document and may only be modified by authorised personnel after review by FRV's Fire Safety Advisory Group.*