

U.S. DEPARTMENT OF TRANSPORTATION FEDERAL AVIATION ADMINISTRATION

Air Traffic Organization Policy



Effective Date: 04/05/2021

SUBJ: Using Facility Power Panel Schedule (FPPS)

1. Purpose of This Order. This order establishes policy for using Facility Power Panel Schedule (FPPS) as a primary tool for critical power management, assigns responsibilities for applicable personnel and organizations to ensure reliability of the National Airspace System (NAS) and safety of the flying public. It is essential to adequately plan the integration of NAS subsystems with minimal impact to the facilities.

Currently the FPPS consists of two independent modules:

- **a.** The FPPS Power Panel Schedule Module, which provides a national configuration managed database for power panel schedules. The use of this module is mandatory where FPPS is implemented for critical panels in Air Route Traffic Control Centers (ARTCCs), level 10 or higher Terminal Radar Approach Control Facilities (TRACONs) and/or Air Traffic Control Towers (ATCTs), and after any major electrical modifications to these facilities. Although not required, all other NAS facilities may elect to utilize this database.
- **b.** The FPPS Library Module, which is a national database for one-line electrical drawings, electrical power engineering calculations, analyses, and studies. The use of this module is mandatory for all Federal Aviation Administration (FAA) facilities (ARTCCs, TRACONs, ATCTs, Center Radar Approach Control, and Air Traffic Control System Command Center) to equipment on runways.
- **2. Audience.** This order is for all FAA employees involved in power systems design, installation, risk assessment, and operation. This includes Engineering Services, Operations Support, Program Offices, Service Areas, Environmental, Occupational, Safety, and Health (EOSH) Services Group, Environmental Support Unit Personnel, engineers, and managers who review and/or approve designs, including those from non-FAA engineering entities.
- **3.** Where Can I Find This Order? You can find this order on the Directives Management System (DMS) website at https://my.faa.gov/tools_resources/orders_notices/. Or, go to the MyFAA Employee website, select 'Tools and Resources' then select 'Orders and Notices'. This order may also be found on the Power Services Group, Orders, Standards, and Specifications webpage:

https://my.faa.gov/org/linebusiness/ato/operations/atc_facilities/power_services/sys_eng_team/stand_specs.html

Distribution: Electronic Initiated By: AJW-222

4. Implementation Date. This order shall be implemented on the effective date of the release of this document. There is no retroactive requirement to populate the FPPS with projects completed before the release date of this order.

- **5. Explanation of Changes.** This order establishes a concise policy on the use of FPPS.
- **6. Responsibilities**. Organizations responsible for uploading and maintaining data in FPPS are: FPPS Power Panel Schedule Modules.
 - **a.** Engineering Services (AJW-2C / AJW-2E / AJW-2W) or designee
 - **b.** Operations Support (AJW-1) personnel or designee
 - **c.** Program Offices initiating projects, or designee

FPPS Library Module

This archived data shall be in two forms: (1) native software files, spreadsheets, etc, used in conducting the study/design, and (2) reports in PDF format:

- a. Engineering Services (AJW-2C / AJW-2E / AJW-2W) or designee
- **b.** Operations Support (AJW-1) personnel or designee
- **c.** Program Offices initiating projects, or designee
- **d.** Power Services Group (AJW-22) Program Offices
- e. Power Operations Engineering Team (AJW-223/17X)
- **f.** EOSH Services Group (AJW-23)
- g. Facilities and Security Services Group (AJW-24) Program Office
- 7. **Policy.** This policy applies to all FAA facilities as defined in this order.

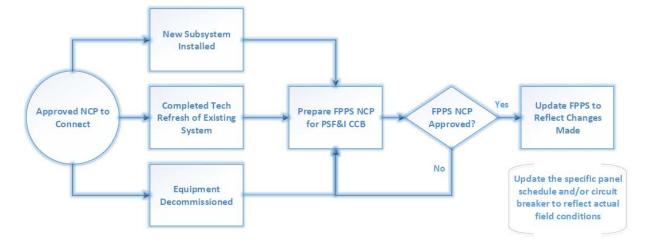
8. Implementation.

There are two databases in the FPPS: the FPPS Power Panel Schedule Module and the FPPS Library Module. Figures 1 and 2 summarize the flow pattern for documenting and/or updating these databases.

a. Implement use of the FPPS Power Panel Schedule Module for all critical panels in (1) ARTCCs, and (2) Level 10 or higher TRACONs and/or ATCTs, after the effective date of this document. Input FPPS Power Panel Schedule Module data for all major electrical modifications (Figure 1).

- **b.** Implement use of the FPPS Library Module for all engineering projects to include power engineering calculation, design, drawings, analysis, specifications, and studies after the effective date of this document (Figure 2). Additions to the Library Module as mandated by order 6950.27, Power System Analyses: Load Flow Calculations, Short Circuit Analysis, Protective Device Coordination Studies, and Arc Flash Risk Assessment, and executed during the following project milestones:
 - (1) As part of the procurement package for both facility and/or equipment,
 - (2) As part of the design package for both facility and/or equipment,
 - (3) Whenever existing facilities are undergoing major modifications,
 - (4) Whenever new equipment or replacement equipment is brought into existing facilities,
 - (5) Whenever an equipment is decommissioned and disconnected from power,
- (6) Any other time, when completing an arc flash risk assessments as stipulated in Order 3900.64, Air Traffic Organization (ATO) Electrical Safety Program.

Figure 1. Procedural Flow for the FPPS Power Panel Schedule Module



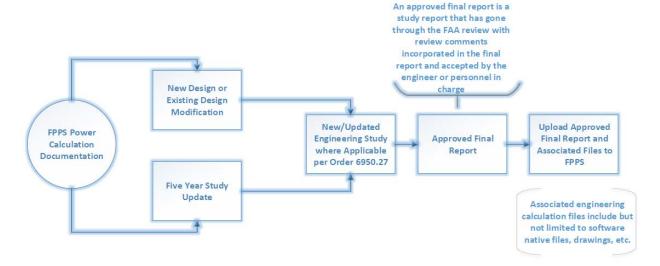


Figure 2. Procedural Flow for the FPPS Library Module

- **9. Distribution.** This order will be distributed electronically.
- **10. Background.** For years, the FPPS power schedule module has been used for ARTCC facilities. This order formalizes and expands the requirements for FPPS across all FAA facilities and establishes boundaries of use. The FPPS system process captured in this order is being implemented for the following reasons:
- **a.** Labeling requirements for Occupational Safety and Health Administration (OSHA) and National Electric Code have expanded over the years. This order establishes a formalized requirement for capturing these requirements.
- **b.** FPPS allows for the reservation of load needs for future use, supporting Program Management Organization (AJM) future needs.
- **c.** FPPS allows for a more detailed description of what NAS loads are lost when a circuit breaker opens. Supports Safety Risk Management (SRM) assessment process.
- **d.** The FPPS library module is intended to capture and save valuable and expensive engineering data for FAA projects that has been lost in the past.

The complete reference to the FPPS User Manual can be found through the link in http://psgis.faa.gov/fpps.

11. Authority to Change This Order. The Air Traffic Control Facilities/Engineering Services directorate issues changes to this order that do not set policy, delegate authority, or assign responsibility.

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