



Federal Aviation Administration

Memorandum

Date: March 7, 2019

From: Richard Doucette, Manager, Environmental Programs, ANE-610

To: Gail Lattrell, Acting Manager, Airports Division, ANE-600
John Donnelly, Regional Counsel, ANE-7

Subject: Westover Metropolitan Airport, Part 150 Record of Approval

Attached is the Record of Approval for the Noise Compatibility Program developed by the Westover Metropolitan Development Corporation for the Westover Metropolitan Airport. The majority of the aircraft noise at Westover is generated by 439th Airlift Wing of the U.S. Air Force Reserve. In recent years, the USAF has transitioned from the older and noisier C-5B to the quieter C-5M aircraft. Also, the number of aircraft based at Westover has been reduced from 16 to 8. The fewer, quieter aircraft operating here has dramatically reduced the noise impacting surrounding residences. Currently there are no homes experience airport-related noise at levels that would qualify for FAA-funded noise mitigation.

No written comments were received during the FAA comment period.

Upon your concurrence/approval below, the *Federal Register* Notice of FAA's approval of the Noise Compatibility Program can be submitted.


John Donnelly
Regional Counsel, ANE-7

3/7/2019
Date

✓
Concur

Nonconcur


Gail Lattrell
Acting Manager, Airports Division, ANE-600

3-7-2019
Date

✓
Approved

Disapproved

RECORD OF APPROVAL

Westover Metropolitan Airport
Chicopee and Ludlow, Massachusetts

FAR PART 150 NOISE COMPATIBILITY PROGRAM

1.0 Introduction

The Westover Metropolitan Airport sponsored an Airport Noise Compatibility Planning Study under a Federal Aviation Administration (FAA) grant, in compliance with 14 CFR Part 150. Westover Municipal Development Corporation produced a report entitled "*Westover Airport/Westover Air Reserve Base Noise Exposure Map and Noise Compatibility Program Update.*" The Noise Compatibility Program (NCP) and its associated Noise Exposure Maps (NEM) were developed concurrently and submitted to FAA for review and approval on November 2, 2018. The NEM was determined to be in compliance on November 7, 2018. This determination was announced in the Federal Register on December 6, 2018. All measures were reviewed for their current status, and for consistency with Part 150.

The study provides an overview of all the noise mitigation measures previously approved in the January 1, 1996 and the February 6, 2015 Records of Approval. This overview can be found in Chapter 5 of the NEM/NCP document. The Airport Sponsor initially proposed to discontinue 4 measures in the existing Noise Compatibility Program, but after further discussion two of these measures will be continued. While no additional residential properties remain inside the 65 DNL noise contour, the noise land acquisition measure (3.1) and sound insulation measure (3.2) will be continued in the event that the noise contours expand in the future.

The 65 DNL noise contour does not extend into Granby, so new subdivision regulations (3.5) are no longer needed in Granby. The sponsor also proposes to end the pilot awareness program (4.1).

The approvals listed herein include approval of actions that the airport recommends be taken by the Federal Aviation Administration (FAA). It should be noted that these approvals indicate only that the actions would, if implemented, be consistent with the purposes of 14 CFR Part 150. The approvals do not constitute decisions to implement the proposed actions or a commitment by the FAA to provide federal financial assistance for these actions. Later decisions concerning possible implementation of these actions may be subject to applicable environmental or other procedures or requirements.

The recommendations below summarize, as closely as possible, the airport operator's recommendations in the noise compatibility program and are cross-referenced to the program. The statements contained within the summarized recommendations and before the indicated FAA approval, disapproval or other determination does not represent the opinions or decisions of the FAA.

2.0 Noise Abatement Measures

The NCP evaluated and recommended several noise abatement measures. These measures were modeled and compared to the noise exposure contours developed under that study, and those which provided a benefit (a reduction in the number of residences and estimated population within the 65 DNL noise contour) were included in the Airport's recommended plan

submitted to the FAA. Each of the four approved measures included consultation with the Westover Tower and Bradley Approach Control, the air traffic facility whose jurisdiction surrounds that of the Westover Tower.

Measures were proposed for both civilian and military operations. The following sections describe each of the measures, the FAA's conclusions at the time (approval or disapproval), and evaluates the procedure in the current environment.

2.1 Nighttime Preferential Runway Use for Civilian Aircraft

This measure calls for civilian aircraft to use Runway 05 for departures and Runway 23 for arrivals to the maximum extent practicable. The recommended pattern of civilian operations would be departures to the north and arrivals from the north, taking advantage of the lower density of residential land uses in Granby and Ludlow. If nighttime operations increased to levels predicted at the time, the airport sponsor would reevaluate the measure to achieve a more balanced level of runway use.

This non-mandatory measure was recommended in part to assist noise abatement efforts once the Westover Tower remained open for 24 hours per day. At the time, civilian operations could not operate at the Airport when the Westover Tower was closed (11:00 p.m. to 7:00 a.m.) without prior arrangement. The 1996 NCP included the assumption that the Westover Tower would begin extended hour operations, although this has not yet occurred. Implementing this measure was forecast to reduce the estimated population within the 65 DNL noise contour south of the Airport.

Current Status: Preferential runway use for civilian operations remains consistent, mostly due to the location of the general aviation facilities (FBO/terminal area). Approximately 80% of civilian operations occur to or from the north. The Westover Tower remains closed to civilian operations from 11:00 p.m. to 7:00 a.m., although the WMDC can, through advanced notification (prior permission), make arrangements for the Westover Tower to open prior to 7:00 a.m. or remain open past 11:00 p.m. Pilot controlled lighting and radio notification procedure upgrades will allow for extended hour, non-tower GA operations to occur in the near future (2019). Such extended hour operations will continue to involve WMDC ground personnel for each operation.

FAA Finding: Approved. (Approved in 1996 and 2015.)

2.2 Noise Abatement Departure Procedures for Military Aircraft on Runway 23

The 1996 NCP proposed that select military C-5 departures from Runway 23 follow a noise abatement procedure. Military operations primarily depart from Runway 23 (south). At the time of the study, C-5 Runway 23 departures were required to climb on runway heading (approximately 230 degrees) until radar contact is confirmed with Bradley Approach Control, located 20 miles south of Westover. Due to the distance between the radar and aircraft, this sometimes resulted in the overflight of heavily populated areas until radar contact was established and aircraft were instructed to turn towards their destination. The proposed flight paths included earlier left or right turns, coordinated with the Bradley Approach Control.

Current Status: The military continues to use Runway 23 as the primary departure runway. C-5M operations use an early turn to the west to avoid overflight of more heavily populated areas.

FAA Finding: Approved. (Approved in 1996 and 2015.)

2.3 Noise Abatement Departure Procedures for Civilian Aircraft on Runway 23

This measure proposed that civilian aircraft, particularly larger and louder aircraft that depart from Runway 23, use a noise abatement heading of 205 or 255 degrees, rather than flying a runway heading (approximately 230 degrees).

FAA Finding: The FAA disapproved this measure in 2015, since it provides no measurable benefit within the 65 DNL contour. The airport authority continues to implement this as a voluntary measure, but no further discussion is required here for purposes of Part 150.

2.4 Noise Abatement Departure Procedures for Civilian Aircraft on Runway 05

The measure called for aircraft, upon departure from Runway 05 and once safely airborne, to turn to an ATC-assigned heading of 080 degrees, then follow instructions issued by Bradley Approach Control towards their respective navigation fix. This early turn of approximately 30 degrees would route departing aircraft further away from the Acrebrook subdivision, taking advantage of more compatible land uses. The measure was proposed to be applicable between the hours of 10:00 p.m. and 6:00 a.m. and was estimated to reduce potential noise impacts in the Acrebrook subdivision, which was also proposed for eligibility under the voluntary acquisition program.

FAA Finding: The FAA disapproved this measure in 2015, since it provides no measurable benefit within the 65 DNL contour. The airport authority continues to implement this as a voluntary measure, but no further discussion is required here for purposes of Part 150.

3.0 Land Use Measures

Land use measures seek to correct existing non-compatible land uses and to further inhibit the development of land uses that could be impacted by noise from aircraft operations. The WMDC does not control the land uses surrounding the Airport, but can make recommendations in consultation with local jurisdictions. The recommended land use measures include mitigation programs (voluntary acquisition and relocation, sound insulation) and preventive measures, which seek to limit the possibility of future non-compatible development.

3.1 Voluntary Land Acquisition and Relocation Program

The intent of the voluntary purchase and relocation program is to eliminate or significantly reduce the number of people remaining in areas of high noise exposure. The 1996 NCP identified approximately 150 residences exposed to 70 DNL, which was updated under the 2004 NEM Update to include approximately 416 potentially eligible structures (single and multi-family structures) within the 70 DNL of the 2003 NEM. The WMDC received funding from the FAA to initiate the voluntary acquisition program in 2005.

This measure was updated in 2015 to allow for acquisition of homes in areas of 65 DNL noise, allowing for the acquisition of 48 parcels inside that noise contour. This allowed for additional acquisitions to occur in an environment with shrinking noise contours.

Current Status: To date, a total of 55 properties, accounting for approximately 220 acres, have been acquired. The shrinking noise contours, caused by fewer flights of quieter aircraft, indicate no properties are currently eligible for noise-related land acquisition. In the event the noise contours expand in the future, this measure will remain this NCP.

FAA Finding: Approved. (Approved in 1996 and 2015.)

3.2 Voluntary Sound Insulation Program

A sound insulation program is a voluntary program with the goal of providing acoustic treatment to eligible homes to reach a 5 dB improvement compared to existing indoor levels. The sound insulation program was initially identified to include those residences within the 65 DNL noise contour, in addition to residences located in the 70 DNL noise contour that declined participation in the voluntary acquisition program.

Current Status: A sound insulation program has not been implemented. The sponsor preferred to complete the voluntary acquisition program prior to initiating a sound insulation program. With fewer flights and quieter aircraft, no properties are proposed or eligible for sound insulation at this time. In the event the noise contours expand in the future, this measure will remain this NCP.

FAA Finding: Approved. (Approved 1996 and 2015.)

3.3 Compatible Use Zoning

Zoning for compatible land uses includes rezoning land that may be developed with noise-sensitive land uses, such as residences, places of worship, or schools. Rezoning would change the development potential of the land to a use that is more compatible with aircraft operations, such as industrial or open space. The 1996 NCP included specific recommendations for each city or town in order to minimize chances that new noncompatible land uses will be developed within the 65 DNL contour. The 1996 NCP suggested that Chicopee, Granby and Ludlow maintain their existing zoning but consider adopting overlay zoning, and that Springfield and South Hadley maintain their existing industrial zoning classifications.

Current Status: Portions of the existing and future NEM 65 DNL contour extends just off airport property to the north and to the south. Currently both areas where the noise contours extend into residentially-zoned areas are undeveloped. This measure is recommended for continuation.

Compatible Use Zoning is an on-going topic of study and discussion within the framework of the Pioneer Valley Planning Commission and the Westover Air Reserve Base Joint Land Use Study (JLUS). The most recent JLUS Update was in 2018 and includes information generated by this NEM/NCP Update effort and focuses on mitigating existing noise impacts and preventing/reducing future incompatible uses.

FAA Finding: Approved. (Approved in 1996 and 2015.)

3.4 Airport Overlay District

An overlay district is a zoning technique which identifies additional restrictions on development in addition to the underlying zoning, by modifying (but not eliminating) the underlying zoning. Overlay districts provide a more flexible development control than changing the allowed uses in entire zoning district.

Since 1992, the Town of Ludlow has had an Aircraft Flight Overlay District intended to protect the public health, safety, and general welfare; and to protect human life and property from hazards of aircraft noise and accident potential created by the Town's proximity to Westover. By 1996, Ludlow had implemented the aircraft flight overlay district, encompassing the noise and accident potential zones from the USAF's AICUZ program. At that time, hospitals, nursing homes, auditoriums and concert halls were prohibited within the overlay districts. Educational and religious institutions are permitted by right in all districts according to the Massachusetts Zoning Enabling Act, and the Town had sought and received home rule authority from the state legislature to allow restriction of development of schools, day care centers, and houses of

worship within accident potential zones. The existing overlay district does not prohibit residential land uses or impose sound insulating requirements on residential lands.

Current Status: No changes to the Town of Ludlow's overlay district have been implemented, and no other jurisdictions have developed an overlay district to date. Implementation of an airport overlay district is still recommended, as it offers an additional level of protection and safety for residents. The airport sponsor will continue to work with each jurisdiction to determine the feasibility of implementing this measure.

FAA Finding: Approved. (Approved in 1996 and 2015.)

3.5 Subdivision Regulations

Subdivision regulations describe the procedures and standards for the division of parcels of land, most notably for sale or development as smaller parcels. The use of subdivision regulations by a municipality prescribes certain conditions that must be met by a developer prior to receipt and recordation of a plat. Generally, amending subdivision regulations is most practical when large amounts of undeveloped land are present.

The 1996 NCP recommended that the Town of Granby, as the jurisdiction with the most notable assemblage of undeveloped land within the 65 DNL noise contour, amend their subdivision regulations to require noise easements to be obtained on newly created lots within the 65 DNL noise contour.

Current Status: The Town of Granby has not included the recommendations requiring noise easements into their subdivision regulations. The 65 DNL noise exposure contour of the Future NEM does **not** extend into Granby. This measure is **not** proposed for continuation in this NCP, and the sponsor recommends disapproval.

FAA Finding: Disapproved. (Approved in 1996 and 2015.)

4.0 Implementation, Monitoring, and Review Measures

Implementation, monitoring, and review measures are those that can be undertaken by the WMDC to track the progress of the recommended noise compatibility program. They include measures that are designed to increase awareness of noise abatement and mitigation, and provisions for the continued monitoring of noise surrounding an Airport. The 1996 NCP identified four measures for inclusion in the program, as described in the following sections.

4.1 Pilot Awareness Program

This measure identified that the WMDC would publish a pamphlet of noise abatement practices to be distributed to civilian pilots through the aviation services provider and WMDC's airport management. The pamphlet would include a map of noise sensitive areas around the airport and describe the operational measures which WMDC has adopted for noise abatement, including use of noise abatement departure procedures recommended by the National Business Aircraft Association or by individual aircraft manufacturers. The measure suggested that the WMDC would install signs in all terminal areas frequented by civilian pilots and along ramp and taxiway areas controlled by the sponsor, instructing pilots to follow noise abatement procedures.

Current Status: The sponsor has installed signs in the terminal area pilot lounge and in areas leading to airside facilities directing pilots to be aware of noise-sensitive locations around the

Airport. This measure is **not** proposed for continuation in this NCP, and the sponsor recommends disapproval

FAA Finding: Disapproved. In 1996 this measure was approved, with the caveat that the location and content of signs may be subject to FAA approval. No additional action taken in 2015.

4.2 Public Awareness Program

Description: This measure served to increase public awareness in the surrounding communities regarding the latest developments in the noise compatibility program.

Current Status: The sponsor maintains contact with local residents and property owners as well as the Pioneer Valley Planning Commission (PVPC) and the Joint Land Use Steering. JLUS information is maintained on the PVPC website and represents an important conduit of information between the general public, the WARB and the WMDC. This portion of the PVPC website should continue to be updated periodically with information critical to the public surrounding the airport.

FAA Finding: Approved. (Approved in 1996 and 2015.)

4.3 Monitoring Nighttime Operations and Runway Use

This measure was intended to assist in the identification and quantification of nighttime aircraft activity, specifically during the hours in which the Westover Tower was closed. Information to be collected included the time, type aircraft, registration/flight number, landing or take-off, runway used, and wind and weather conditions. The information would be used to determine compliance with sponsor's nighttime noise rule and to help provide guidance to Air Force contract tower personnel to determine compliance with the preferential runway use program.

Current Status: The Westover Tower tracks operations during the hours the tower is open. Minimum operations occur during nighttime hours (10:00 p.m. to 7:00 a.m.). The airport is currently considering extending the operating hours of the airport, so monitoring of nighttime noise is now a relevant and timely issue. Nighttime operations monitoring information would be used to enhance planning of staff and physical resources to meet existing and future demand. Additionally, monitored data would be used towards improving the accuracy of future noise analyses as monitoring would provide detailed information on aircraft types, origin/destination, and runway use.

FAA Finding: Approved. In 1996 the FAA approved in part and disapproved in part this measure. No additional action was taken in 2015. In 1996, the FAA required the submittal of additional information regarding the noise rule, and stated that using the data to ensure compliance with any rules that would essentially limit aircraft operations would require an additional noise study. Nighttime noise monitoring as described is allowed.

4.4 Periodic Updates of Noise Exposure

This measure recommended the ongoing monitoring of changes in noise exposure at the Airport, primarily by focusing on the changes that would likely have the greatest impact to cause an increase in cumulative noise exposure. The original measure identified, as primary potential drivers of noise exposure, any planned changes in scheduled jet operations by civilian aircraft, any planned changes in nighttime operations by civil aircraft, or annual changes in total civil operations.

Current Status: The sponsor has completed multiple evaluations of noise exposure as a result of changes in operations, including this update. The sponsor will provide periodic NEM updates as required by law and regulation.

FAA Finding: Approved. (Approved 1996 and 2015.)