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FEDERAL AVIATION ADMINISTRATION
National Policy

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SUBJ: Procedures for the Evaluation and Approval of Facilities for Special
Authorization Category I Operations and All Category II and III Operations

This order provides guidance for all personnel in the approval of facilities for Category (CAT) I Runway Visual Range (RVR) 1800 at runways with reduced lighting, Special Authorization (SA) CAT I and all CAT II and CAT III.

With a growing emphasis on performance-based operations, different levels of operation may be authorized based on the flight equipment of a specific operator and the ground equipment available at specific runways. While certain ground facility requirements are needed to support all levels of either CAT I, CAT II, or CAT III operations, a higher category of operations may be performed on different “types” of ground equipment if the airborne equipment, crew training, or other factors offset any changes in ground facility requirements. In these situations, operations are predicated on the use of specific equipment and/or procedures, which will be required in the operator’s applicable authorization (such as an operations specification (OpSpec), management specification (MSpec), or Letter of Authorization (LOA)).

A handwritten signature in black ink, appearing to read "R. C. Carty".

Robert C. Carty
Deputy Executive Director, Flight Standards Service

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Chapter 1. General Information

1. Purpose of This Order. This order lists the minimum requirements for evaluation and approval of ground facilities supporting Category (CAT) I approaches and CAT II approaches to runways which do not meet all performance or equipment requirements of a U.S. Standard or International Civil Aviation Organization (ICAO) Standard, and for all CAT II and CAT III approaches. Specifically, this order addresses the following items:

a. Lists the minimum requirements for CAT II and III operations at various facilities. The Federal Aviation Administration (FAA) criteria for CAT II and III operations meet ICAO CAT II and III standards.

b. Lists the minimum requirements for CAT I approaches using a Runway Visual Range (RVR) minimum of 1800 feet and a decision altitude (DA) of 200 feet, and CAT I approaches using an RVR minimum as low as 1400 feet and a radio altimeter (RA) decision height (DH) as low as 150 feet height above touchdown (HAT) at runways which do not have touchdown zone (TDZ) and/or runway centerline (RCL) lighting.

c. Lists the minimum requirements for CAT I approaches using an RVR minimum as low as 1400 feet and an RA DH as low as 150 feet HAT on suitable instrument landing system (ILS) equipment at runways that do not have TDZ and/or RCL lighting.

d. Implements FAA policy regarding Localizer (LOC) performance with vertical guidance (LPV) approaches and a Ground Based Augmentation System (GBAS) Landing System (GLS) with a DH of 200 feet and visibility minimums of RVR 1800 to airfields with reduced lighting.

e. Lists the minimum requirements for CAT II approval to runways, which do not meet the equipment requirements of a U.S. Standard or ICAO Standard.

f. Implements FAA policy regarding CAT II approach operations with an RVR minimum of 1000 feet to runways, which meet U.S. and ICAO Standards for CAT II equipment, performance, and lighting.

2. Audience. The audience for this order is FAA personnel involved in the evaluation, implementation, and approval of ground facilities for Special Authorization (SA) CAT I instrument approaches, and for all CAT II and III instrument approaches.

3. Where You Can Find This Order. You can find this order on the MyFAA employee website at https://employees.faa.gov/tools_resources/orders_notices. Inspectors can access this order through the Flight Standards Information Management System (FSIMS) at <http://fsims.avs.faa.gov>. Air carriers (operators) can find this order on the FAA's website at <http://fsims.faa.gov>. This order is available to the public at http://www.faa.gov/regulations_policies/orders_notices.

4. What This Order Cancels. This order cancels Order 8400.13E, Procedures for the Evaluation and Approval of Facilities for Special Authorization Category I Operations and All Category II and III Operations, dated May 15, 2018.

5. Explanation of Changes. This revision removes guidance concerning chart notes on below standard CAT I procedures that is already contained in FAA Order 8260.19, Flight Procedures and Airspace. This revision also incorporates references to the newly published Advisory Circular (AC) 120-118, Criteria for Approval/Authorization of All Weather Operations (AWO) for Takeoff, Landing, and Rollout, and updates organizational nomenclature resulting from the recent Flight Standards Service (FS) reorganization.

6. Explanation of Appendices.

a. Appendix A, References (current editions). Contains a listing of relevant ACs and FAA orders.

b. Appendix B, Abbreviations and Acronyms. Contains a listing of abbreviations and acronyms used in this order.

c. Appendix C, Sample Checklists for Evaluating Ground Facilities for SA CAT II Operations. Contains a set of checklists for use by Technical Operations Services (AJW), Air Traffic Services (AJT), Airports (ARP), Aeronautical Information Services (AJV-A), and FS personnel to evaluate potential for SA CAT II operations. Other checklists, such as checklists from previous versions of this order, may be acceptable if these checklists provide sufficient information for FS authorization. These checklists are also available on the Flight Technologies and Procedures Division website at https://www.faa.gov/about/office_org/headquarters_offices/avs/offices/afx/afs/afs400/afs410/.

d. Appendix D, Sample Checklists for Evaluating Ground Facilities for CAT II and CAT III Operations. Contains a set of checklists for use by AJW, AJT, ARP, AJV-A, and FS personnel to evaluate potential for standard CAT II and standard CAT III operations. Other checklists, such as checklists from previous versions of this order, may be acceptable if these checklists provide sufficient information for FS authorization. These checklists are also available on the Flight Technologies and Procedures Division website at https://www.faa.gov/about/office_org/headquarters_offices/avs/offices/afx/afs/afs400/afs410/.

7. Background.

a. Ground Navigation Equipment. Historically, in the United States and internationally, ground navigation equipment was designated to correlate with a specific operation. For example, in ICAO Annex 10, Aeronautical Telecommunications, Volume I, Radio Navigation Aids, a Facility Performance CAT II — ILS is associated with an operational performance CAT II procedure. The basic assumption of this correlation is that a certain level of performance by ground navigation equipment is necessary to support the corresponding airborne operation.

b. “Type” Classification. The term “type” is used in this order to differentiate the ground facility from the CAT of flight operation (i.e., Type II ILS facility, as opposed to CAT II operations or CAT III instrument approach minimums). This distinction is intended to eliminate existing confusion between facility establishment criteria and operational criteria for approval of CAT I, CAT II, or CAT III flight operations. Typically, the type classification defines the ground equipment necessary to support precision approach and landing operations by aircraft and operators, which meet the minimum airborne equipment requirements for that CAT of

operations. While certain ground facility requirements are needed to support all levels of either CAT I, CAT II, or CAT III operations, a higher CAT of operations may be performed on different types of ground equipment if the airborne equipment, crew training, or other factors offset any changes in ground facility requirements. The higher performance capabilities of new and improved avionics have mitigated some of the performance requirements of the ground-based navigation equipment.

c. Type I Facility. A Type I facility is defined as all LOC and glideslope (GS) facilities not meeting the definition of Type II or Type III and which have a published straight-in course coincident with the centerline (CL) of the runway or an offset LOC which is not offset in excess of 3.0 degrees from the CL of the runway.

d. Type II Facility. A U.S. Type II facility meets or exceeds all requirements for an ICAO Facility Performance Category II — ILS as specified in ICAO Annex 10, Volume I, Chapter 3, Specifications for Radio Navigation Aids. U.S. Type II facilities are designated as such by AJW, and meet all the requirements to support CAT II approach and landing operations.

e. Type III Facility. A U.S. Type III facility meets or exceeds all ICAO criteria as specified in ICAO Annex 10, Volume I, chapter 3 and is identified as “CAT III” in standards, recommended practices, or guidance material. A Type III facility typically consists of a dual frequency LOC which meets all CAT III requirements to at least a point 3000 feet from the approach end of the runway, a GS which meets CAT III requirements to the threshold, executive integrity monitors which identify any degradation of signal integrity exceeding CAT III standards, and a far field monitor to identify critical area incursions or signal variations in the far field which may affect signal integrity, backup transmitters, and backup power to ensure continuous power for critical systems. A Type III facility typically includes ancillary equipment such as full runway edge, end, and in-pavement lighting (e.g., High Intensity Runway Lights (HIRL), TDZ lights, and RCL lights), an Approach Lighting System with Sequenced Flashing Lights (ALSF)-2, and power changeover requirements to ensure continuous power for critical lighting systems. Type III facility requirements reflect the fact that CAT III operations are highly dependent on the accuracy, integrity, and reliability of ground equipment throughout approach, landing, and rollout.

8. Distribution. This order is distributed to all FS divisions, branches, and offices. This order is distributed electronically only.

9. Directive Feedback Information. The Flight Technologies and Procedures Division establishes criteria for the procedures authorized by this order. Direct questions or comments to the Flight Technologies and Procedures Division at 202-267-8795. For your convenience, FAA Form 1320-19, Directive Feedback Information, is the last page of this order. Note any deficiencies found, clarifications needed, or suggested improvements regarding the contents of this order on FAA Form 1320-19, and forward your comments to the originating office for consideration. If an interpretation is needed immediately, call the originating office for guidance. However, use FAA Form 1320-19 as a followup to verbal conversation.

Chapter 2. CAT I RVR 1800 Approach Operations

1. Scope. This order authorizes the creation and implementation of CAT I approaches to include LPV and GLS, with a DA of 200 feet and visibility minimums of RVR 1800 at runways with reduced lighting. Existing Title 14 of the Code of Federal Regulations (14 CFR) part 97 procedures which did not qualify for RVR 1800 due to absence of TDZ and CL may also be amended to include RVR 1800. Such operations require the use of flight director (FD) or autopilot (AP) or Head-Up Display (HUD) to DA.

2. Requirements.

a. CAT I Approaches to RVR 1800. To be eligible for CAT I approaches to RVR 1800, runways must have, or be qualified for, a part 97 Standard Instrument Approach Procedure (SIAP). If the facility/approach has restrictions, it must be approved by the Flight Technologies and Procedures Division in coordination with Flight Program Operations (AJF-0) on a case-by-case basis.

b. Runway Qualifications. Runways must have, or be qualified for, a CAT I DA of 200 feet or less and a visibility minimum of not more than RVR 2400.

c. Runway Declared Landing Distance. The runway must have a declared landing distance of 5000 feet or greater. For runways without published declared distances, the declared distances may be assumed to be equal to the physical length of the runway minus any threshold displacement.

d. Required Lighting and Ancillary Equipment.

(1) A simplified short approach lighting system with runway alignment indicator lights (SSALR), medium intensity approach lighting system with runway alignment indicator lights (MALSR), or ALSF-1/ALSF-2;

(2) HIRL; and

(3) A TDZ sensor of an RVR reporting system.

e. Instrument Approach Procedure (IAP).

(1) The threshold crossing height (TCH), reference datum height (RDH), or achieved reference datum height (ARDH) must not exceed 60 feet.

(2) For a new or existing part 97 CAT I SIAP, the DA must not exceed 200 feet.

3. Operational Approval.

a. Checklists. Completion of the checklists in Appendix C, Sample Checklists for Evaluating Ground Facilities for SA CAT II Operations, or Appendix D, Sample Checklists for Evaluating Ground Facilities for CAT II and CAT III Operations, is not required.

b. Operations for RVR 1800. When RVR 1800 operations are authorized, it will be documented on the applicable FAA Form 8260-3, ILS Standard Instrument Approach Procedure. Individual SIAPs become available to approved operators by amending the part 97 CAT I SIAP. When approved, and prior to the part 97 CAT I SIAP being amended, a Notice to Airmen (NOTAM) will be issued which authorizes RVR 1800.

c. CAT I Operations to RVR 1800. CAT I operations to RVR 1800 will be added to existing CAT I SIAPs in accordance with a schedule established by the Instrument Flight Procedures (IFP) Validation Team.

Chapter 3. SA CAT I Approach Operations

1. Scope. This order authorizes CAT I approaches with a DH as low as 150 feet (HAT using RA minimums) and a visibility minimum as low as RVR 1400 on suitable ILS equipment at runways with reduced lighting. These operations require the use of airborne equipment in accordance with AC 120-118.

2. Airport Traffic Control Tower (ATCT). SA CAT I operations require an operational ATCT to ensure separation of airborne and ground traffic in low-visibility conditions, to ensure proper protection of the LOC and GS critical areas, and to accomplish the required monitoring of ground equipment.

3. Requirements.

a. CAT I Approaches as Low as RVR 1400. To be eligible for SA CAT I approaches as low as RVR 1400 and 150 feet DH, runways must have, or be qualified for, a part 97 SIAP. If the instrument approach has restrictions, it must be approved by the Flight Technologies and Procedures Division in coordination with AJF-0 on a case-by-case basis.

b. Runway Qualifications. Runways must have, or be qualified for, CAT I DA of 200 feet and a visibility minimum of not more than RVR 2400.

c. SA CAT I Landing Minimums. Single-pilot operators are prohibited from using SA CAT I landing minimums.

d. Runway Declared Landing Distances. The runway must have a declared landing distance of 5000 feet or greater. For runways without published declared distances, the declared distances may be assumed to be equal to the physical length of the runway minus any threshold displacement.

e. Required Lighting and Ancillary Equipment.

(1) An SSALR, MALSR (with threshold bar that is separate from runway end lights), or ALSF-1/ALSF-2;

(2) HIRL; and

(3) A TDZ sensor of an RVR reporting system.

f. IAP Qualifications.

(1) The commissioned glide path (GP) angle shall be 3.0 degrees. Angles other than 3.0 degrees require approval of the Flight Operations Group.

(2) The TCH, RDH, or ARDH must not exceed 60 feet.

(3) Obstacle Free Zones (OFZ) must meet the CAT I OFZ standards described in AC 150/5300-13, Airport Design.

(4) Obstructions must not penetrate the approach light plane in accordance with FAA Order JO 6850.2, Visual Guidance Lighting Systems, and AC 150/5340-30, Design and Installation Details for Airport Visual Aids.

(5) The GS clearance below path checks must be satisfactory to runway threshold.

(6) On runways with established CAT II/III approaches, apply the Terminal Instrument Procedures (TERPS) CAT II/III missed approach standards in accordance with FAA Order 8260.3, United States Standard for Terminal Instrument Procedures (TERPS). On runways with suitable CAT I approaches, apply the CAT I missed approach criteria specified within Order 8260.3. When applying the CAT I missed approach criteria, obstacles located within section 1 of the missed approach, including taxiing or holding aircraft, may be considered acceptable and excluded from consideration. This is provided that the obstacle type and the prerequisites for exclusion meet policy requirements for acceptable obstacles as specified within Order 8260.3, Section 10-6, PA and APV Obstacle Assessment. If the DH is increased to accommodate an obstacle in accordance with TERPS standards, the RVR must be increased in accordance with Table 3-1 below. If the DH using TERPS standards is increased by 50 feet or less to accommodate an obstacle, the SA CAT I DH need not be adjusted.

Table 3-1. Minimum Visibility Values

HAT Range	RVR
150-170	1400
171-185	1600

4. Operational Approval.

a. Checklists. Completion of all checklists in Appendices C and D is not required. AJF-0 submits a completed Aviation System Standards (AVN) ILS CAT Checklist upon completion of the flight inspection, if applicable.

b. Airport Sponsor Involvement. Airport sponsor involvement (letter of concurrence) is required and must be submitted through the appropriate Airport District Office (ADO) or Airport Regional Office, as applicable. This may include the willingness to remove obstacles, provide resources such as personnel and funding, and install additional equipment such as lights, markings, signage, etc.

c. SA CAT I Operations. When SA CAT I operations are authorized, it will be documented on the applicable FAA Form 8260-3. When operators are approved to use the new minimum, it will be authorized by the appropriate operations specification (OpSpec)/management specification (MSpec)/Letter of Authorization (LOA). Individual SIAPs become available to approved operators upon publication of the part 97 CAT I SIAP.

Chapter 4. Standard CAT II Approach Operations

1. Scope. This order authorizes CAT II approaches with a DH as low as 100 feet and visibility minimums as low as RVR 1200. This order addresses the ground equipment requirements necessary for approval of a CAT II approach. For information on other requirements, refer to AC 120-118.

2. ATCT. CAT II operations require an operational ATCT to ensure separation of airborne and ground traffic in low-visibility conditions, to ensure proper protection of the LOC and GS critical areas, and to accomplish the required monitoring of ground equipment.

3. Required Lighting and Ancillary Equipment. To be eligible for standard CAT II operations at RVR 1600 or 1200, runways must have, or be qualified for, a part 97 CAT I SIAP with a DH of 200 feet, with at least the following ancillary components:

- An ALSF-2,
- HIRL,
- TDZ lighting, and
- RCL lighting.

a. Runway and Approach Lighting Systems. Runway and approach lighting systems must have standby power with a 1-second transfer and must be remotely monitored so that aircraft can be notified immediately if they become inoperative.

b. CAT II Operations. All CAT II operations require a touchdown RVR sensor. A rollout sensor is also required for CAT II operations below RVR 1600. When the runway is in excess of 8000 feet in length, a midpoint RVR sensor is required in addition to the touchdown and rollout sensors for CAT II operations below RVR 1600. The Flight Technologies and Procedures Division may approve CAT II operations on a runway in excess of 8000 feet with only a TDZ and rollout sensor on a case-by-case basis.

c. Power Transfer Requirements. The touchdown RVR system must have standby power with a 1-second transfer in the event of a primary power source outage.

4. ILS.

a. ILS Performance Standards. The ILS must be certified and maintained, and the critical areas must be protected to provide not less than performance classification II/D/2. ILS performance standards to Point D are defined in FAA Order 8200.1, United States Standard Flight Inspection Manual. Level 2 Continuity of Service (CoS) requirements are defined in FAA Order 6750.24, Instrument Landing System and Ancillary Electronic Component Configuration and Performance Requirements; and FAA Order JO 6750.57, Instrument Landing System Continuity of Service Requirements and Procedures. Additionally, in accordance with Order 6750.24, operational constraints may be used to accommodate excessively large critical areas.

b. Transmitter Requirements. The LOC and GS must be dual transmitter and dual monitor systems to provide the required redundancy and integrity to support CAT II approach and landing operations.

c. Inner Marker (IM) Requirement. An IM is not required to support CAT II approach and landing operations, unless an RA minimum is not authorized due to terrain, obstacles, or other local requirements.

d. Status Monitoring. The LOC, GS, and IM (if operationally required due to terrain) operational status (e.g., on/off) must be remotely monitored by the controlling air traffic control (ATC) element. This status monitoring is distinct from any remote maintenance monitoring for the benefit of maintenance personnel and distinct from the local executive integrity monitor, which automatically shuts down the facility when monitored parameters exceed specified tolerances. The remote status monitoring can be implemented by landlines, through-the-air receivers, fiber optics, radio links, etc.

e. Backup Power Source. The LOC, GS, and IM (if operationally required) must have an approved backup power source, which provides an uninterrupted power supply in the event of a primary power source outage.

f. LOC Far Field Monitor. An LOC far field monitor is required.

5. IAP.

a. LOC Final Course Alignment. The LOC final course alignment must be coincident with the RCL.

b. GP Angle. The commissioned GP angle shall be 3.0 degrees. Angles other than 3.0 degrees require approval of FS.

c. TCH/RDH/ARDH. The commissioned TCH/RDH/ARDH shall be between 50 and 60 feet, with the optimum being 55 feet. Any deviation must meet current TERPS CAT II/III development standards, or must have a formal FS waiver to TERPS.

d. OFZ Standards. OFZ must meet the CAT II/III OFZ standards described in AC 150/5300-13.

e. Obstructions. Obstructions must not penetrate the approach light plane in accordance with Order JO 6850.2 and AC 150/5340-30.

f. Missed Approach Segment. The missed approach segment must meet the current TERPS CAT II/III development standard.

g. Aeronautical Information Services (AJV-A) Procedures. AJV-A develops these procedures in accordance with the standard TERPS CAT II development criteria and process as a part 97 SIAP.

6. Operational Approval.

a. Standard CAT II SIAP Requests. Any operator or organization can initiate requests for standard CAT II SIAPs for a specific runway.

b. Checklists. Distribution and coordination of all checklists in Appendix D is the responsibility of the appropriate Flight Technologies and Procedures Division representative. Each checklist must be completed and signed by appropriate personnel. However, further confirmation of all items on the checklists is at the discretion of the appropriate Flight Technologies and Procedures Division representative.

c. Airport Sponsor Involvement. Airport sponsor involvement (letter of concurrence) is required and must be submitted through the appropriate ADO or Airport Regional Office, as applicable. This may include the willingness to remove obstacles, provide resources such as personnel and funding, and install additional equipment such as lights, markings, signage, etc.

d. Responsibility for Maintaining Performance Classification Standards. AJW must agree to install/adjust and maintain the facility to the required performance classification standard as described in this order and in Order 8200.1, and ensure that it meets integrity, continuity, and Mean Time Between Outages (MTBO) requirements as described in Order 6750.24 and Order JO 6750.57.

e. Flight Inspection Tolerances. The approach must be certified to CAT II flight inspection tolerances.

f. Operational Review and Approval. Operational review and approval by the appropriate Flight Technologies and Procedures Division representative of a particular aircraft type and site-specific performance regarding “special terrain” airport runways is necessary for all CAT II minimum approvals that are predicated on the use of autoland or other flight guidance systems (FGS) (e.g., HUD) to touchdown.

g. Approach System Failures. Any failures of the approach system and ancillary components, which support CAT II operations that would normally downgrade the system, must be acted on in accordance with the procedures contained in Order 6750.24.

Chapter 5. SA CAT II Approach Operations

1. Scope. This order authorizes SA CAT II approaches with a DH as low as 100 feet and visibility minimums as low as RVR 1200 using aircraft autoland or HUD approved to touchdown. CAT II procedures developed and approved using the criteria contained in previous versions of this order do not require any additional changes for continued use, but must continue to meet either the criteria at initial approval or the current criteria in this order. The instrument approach and ground facilities must meet all CAT II requirements as listed in Chapter 4, Standard CAT II Approach Operations, to support CAT II operations, except for the items specifically identified as not required in this chapter. Current SA CAT II approaches are based on CAT I ILS equipment; however, SA approaches that meet acceptable levels of safety and are approved for CAT I approaches may be approved through the Flight Technologies and Procedures Division.

2. ATCT. SA CAT II operations require an operational ATCT to ensure separation of airborne and ground traffic in low-visibility conditions, to ensure proper protection of the LOC and GS critical areas, and to accomplish the required monitoring of ground equipment.

3. Runways. The runway must have a declared landing distance of 6000 feet or greater. For runways without published declared distances, the declared distances may be assumed to be equal to the physical length of the runway minus any threshold displacement.

4. Required Lighting and Ancillary Equipment. To be eligible for SA CAT II, runways must have, or be qualified for, a part 97 CAT I SIAP with a DH of 200 feet and a visibility minimum not more than RVR 1800, with at least the following ancillary components:

- SSALR,
- MALS (with threshold bar that is separate from runway end lights),
- ALSF-1/ALSF-2, and
- HIRL.

a. SA CAT II Operations. SA CAT II operations at RVR 1600 require a TDZ sensor of an RVR reporting system. SA CAT II operations at RVR 1200 require not less than two sensors of an RVR reporting system, and one of the required sensors must be for the TDZ. When the runway is in excess of 8000 feet in length, a midpoint RVR sensor is required in addition to the touchdown and rollout sensors for CAT II operations below RVR 1600. The Flight Technologies and Procedures Division may approve CAT II operations on a runway in excess of 8000 feet with only a TDZ and rollout sensor on a case-by-case basis.

b. Runway Lighting Systems. Runway lighting systems must have standby power with a 1-second transfer and must be remotely monitored so that aircraft can be notified immediately if they become inoperative. An alternative for when remote monitoring is not available is to station a cognizant person to visually monitor the runway lighting system during low-visibility operations, who immediately notifies the controlling ATC element if they become inoperative.

c. Approach Lighting System. The approach lighting system does not require standby power or remote monitoring.

5. ILS.

a. Approach or Approach Facility Restrictions. If the approach or approach facility has restrictions, it must be approved by the Flight Technologies and Procedures Division in coordination with AJF-0 on a case-by-case basis. The approach must be certified and maintained, and the critical areas must be protected to provide not less than performance classification II/D/2. ILS performance standards to Point D are defined in Order 8200.1. Level 2 CoS requirements are defined in Order 6750.24 and Order JO 6750.57. Additionally, in accordance with Order 6750.24, operational constraints may be used to accommodate excessively large critical areas.

b. Transmitter Facilities. Dual transmitter facilities are recommended, but single transmitter facilities are also acceptable. The critical area requirement for single frequency systems may be too large to protect; therefore, dual frequency systems are required.

c. IM Requirement. An IM is not required to support CAT II approach and landing operations, unless an RA minimum is not authorized due to terrain, obstacles, or other local requirements.

d. ATC Element Remote Monitoring. The LOC, GS, and IM (if operationally required due to terrain) operational status (e.g., on/off) must be remotely monitored by the controlling ATC element. This status monitoring is distinct from the remote maintenance monitoring done for the benefit of maintenance personnel and distinct from the local executive integrity monitor, which automatically shuts down the facility when monitored parameters exceed specified tolerances. The remote status monitoring can be implemented by landlines, through-the-air receivers, fiber optics, radio links, etc. An alternative for when none of these is available is to station a cognizant person at each subsystem during low-visibility operations, who immediately notifies the controlling ATC element when the LOC or GS is turned off by the executive integrity monitor.

e. LOC Far Field Monitor. An LOC far field monitor is not required.

6. IAP. AJV-A develops these procedures in accordance with the standard TERPS CAT II development criteria and process as a part 97 SIAP.

7. Operational Approval.

a. SA CAT II SIAP Requests. Any operator or organization can initiate requests for SA CAT II SIAPs for a specific runway.

b. Checklists. Distribution and coordination of all checklists in Appendix C is the responsibility of the appropriate Flight Technologies and Procedures Division representative. Each checklist must be completed and signed by appropriate personnel. However, further confirmation of all items on the checklists is at the discretion of the appropriate Flight Technologies and Procedures Division representative.

c. Airport Sponsor Involvement. Airport sponsor involvement (letter of concurrence) is required and must be submitted through the appropriate ADO or Airport Regional Office, as

applicable. This may include the willingness to remove obstacles, provide resources such as personnel and funding, and install additional equipment such as lights, markings, signage, etc.

d. Responsibility for Maintaining Performance Classification Standards. AJW must agree to adjust and maintain the facility to a CAT II performance classification standard and ensure that it meets at least Level 2 integrity, continuity, and MTBO requirements. (For classification system ratings, refer to Order 6750.24 and Order JO 6750.57.)

e. Flight Inspection Tolerances. The approach must be certified to CAT II flight inspection tolerances including the LOC CAT III structure to Point D. The first two characters of the ILS performance classification system rating will be published in the Airport/Facility Directory (A/FD) section of the appropriate Chart Supplement.

f. Operational Review and Approval. Operational review and approval by the Flight Technologies and Procedures Division of a particular aircraft type and site-specific performance regarding “special terrain” airport runways is necessary for CAT II minimum approvals because it is predicated on the use of autoland or other FGSs (e.g., HUD) to touchdown.

g. Standard CAT II and III Facility Authorizations. Approved standard CAT II and III facilities are also authorized for continued CAT II operations in the event of a failure of TDZ and/or RCL lighting, or a downgrade from an ALSF-1 or ALSF-2 to an SSALR if authorized in the operator’s OpSpec, MSpec, or LOA.

h. ICAO Operational Performance CAT II. This operation cannot be promulgated as an ICAO operational performance CAT II due to the lack of TDZ, RCL, and ALSF-2 lighting systems, as required by ICAO Annex 14, Aerodromes. Minus those exceptions, however, any failures that would normally downgrade the system (including any changes to required procedures, such as visual or remote monitoring procedures) based on directive requirements such as Order 6750.24, etc., must be acted on in accordance with the standard procedures in effect for any CAT II authorization.

Chapter 6. CAT II RVR 1000 Approach Operations

- 1. Scope.** This order authorizes CAT II approaches with a DH as low as 100 feet and visibility minimums of RVR 1000 using aircraft autoland or HUD approved to touchdown to runways which meet all CAT II equipment, performance, and lighting requirements.
- 2. ATCT.** CAT II operations require an operational ATCT to ensure separation of airborne and ground traffic in low-visibility conditions to ensure proper protection of the LOC and GS critical areas and to accomplish the required monitoring of ground equipment.
- 3. Required Lighting and Ancillary Equipment.** To be eligible for CAT II operations at RVR 1000, runways must meet all equipment, performance, and lighting requirements for a standard CAT II runway as listed in Chapter 4. Additionally, airports approved for scheduled air carrier operations below RVR 1200 are required to have some or all of the various lighting systems (e.g., taxiway CL lights, runway guard lights (RGL), stop bars, and clearance bars) discussed in AC 150/5340-30, Chapter 4, Taxiway Lighting Systems, per the criteria in AC 120-57, Surface Movement Guidance and Control System; and the FAA-approved Surface Movement Guidance and Control System (SMGCS) plan.
- 4. ILS.**
 - a. CAT II Facility Requirements.** The ILS must meet all requirements of a CAT II ILS facility as listed in Chapter 4.
 - b. ILS Performance Standards.** The ILS must be certified and maintained, and the critical areas must be protected to provide not less than performance classification II/D/2. ILS performance standards to Point D are defined in Order 8200.1. Level 2 CoS requirements are defined in Order 6750.24 and Order JO 6750.57. Additionally, in accordance with Order 6750.24, operational constraints may be used to accommodate excessively large critical areas.
- 5. IAP.** AJV-A develops these procedures in accordance with the standard TERPS CAT II development criteria and process as a part 97 SIAP.
- 6. Operational Approval.**
 - a. Checklists.** Completion of the checklists in Appendix D is not required for runways with published CAT II minimums to RVR 1200. When implementing new CAT II or CAT III minimums, CAT II to RVR 1000 is an option on the checklists in Appendix D.
 - b. CAT II SIAP Requests.** Any operator or organization can initiate requests for CAT II SIAPs to RVR 1000 for a specific runway.
 - c. CAT II Operations to RVR 1000.** CAT II operations to RVR 1000 will be added to existing CAT II SIAPs in accordance with a schedule established by the IFP.
 - d. Flight Inspection Tolerances.** The ILS must be certified to CAT II flight inspection tolerances including LOC CAT III structure to Point D. The first two characters of the ILS

performance classification system rating will be published in the A/FD section of the appropriate Chart Supplement.

e. Operational Review and Approval. Operational review and approval by the Flight Technologies and Procedures Division of a particular aircraft type and site-specific performance regarding “special terrain” airport runways is necessary for CAT II minimum approvals because it is predicated on the use of autoland or other FGSs (e.g., HUD) to touchdown.

Chapter 7. Standard CAT III Approach Operations

1. Scope. This order authorizes CAT III approaches with minimums as low as RVR 300 without a DH. This order addresses the ground equipment requirements necessary for approval of a CAT III ILS approach. For information on other requirements, refer to AC 120-118.

2. ATCT. CAT III operations require an operational ATCT to ensure separation of airborne and ground traffic in low-visibility conditions, to ensure proper protection of the LOC and GS critical areas, and to accomplish the required monitoring of ground equipment.

3. Required Lighting and Ancillary Equipment. To be eligible for CAT III operations, runways must have at least the following ancillary components:

- An ALSF-2,
- HIRL,
- TDZ lighting, and
- RCL lighting.

a. Runway and Approach Lighting Systems. Runway and approach lighting systems must have standby power with a 1-second transfer and must be remotely monitored so that aircraft can be notified immediately if they become inoperative.

b. CAT III Operations. CAT III operations require a TDZ, midpoint, and rollout sensor of an RVR reporting system. The Flight Technologies and Procedures Division may approve CAT III operations on a runway with only two RVR sensors (a TDZ and either a midpoint or rollout RVR sensor) on a case-by-case basis.

c. Power Transfer Requirements. In the event of a primary power source outage, each required RVR system must have standby power with a 1-second transfer.

d. Runways. A grooved runway is required for standard CAT III approach operations.

e. Airport Lighting System Requirements. Airports approved for scheduled air carrier operations below RVR 1200 are required to have some or all of the various lighting systems (e.g., taxiway CL lights, RGL, stop bars, and clearance bars) discussed in AC 150/5340-30, chapter 4, per the criteria in AC 120-57 and the FAA-approved SMGCS plan.

4. ILS.

a. ILS Certification. The ILS must be certified and maintained; and the critical areas must be protected to provide not less than performance classification:

- (1) III/D/3 for operations as low as RVR 700,
- (2) III/E/3 for operations as low as RVR 600, or
- (3) III/E/4 for operations as low as RVR 300.

b. ILS Performance Standards. ILS performance standards to Point D or Point E are defined in Order 8200.1. Level 3 and Level 4 CoS requirements are defined in Order 6750.24 and Order JO 6750.57. Additionally, in accordance with Order 6750.24, operational constraints may be used to accommodate excessively large critical areas.

c. CAT III Approach and Landing Operations. The LOC and GS must be dual transmitter and dual monitor systems to provide the required redundancy and integrity to support CAT III approach and landing operations.

d. Status Monitoring. The LOC and GS, and IM (if operationally required due to terrain) operational status (e.g., on/off) must be remotely monitored by the controlling ATC element. This status monitoring is distinct from any remote maintenance monitoring for the benefit of maintenance personnel and distinct from the local executive integrity monitor, which automatically shuts down the facility when monitored parameters exceed specified tolerances. The remote status monitoring can be implemented by landlines, through-the-air receivers, fiber optics, radio links, etc.

e. Backup Power Source. The LOC, GS, and IM (if operationally required) must have a backup power source, which provides an uninterrupted power supply in the event of a primary power source outage.

f. LOC Far Field Monitor. An LOC far field monitor is required.

5. IAP.

a. LOC Final Course Alignment. The LOC final course alignment must be coincident with the RCL.

b. GP Angle. The commissioned GP angle shall be 3.0 degrees. Angles other than 3.0 degrees require approval of FS.

c. TCH/RDH/ARDH. The commissioned TCH/RDH/ARDH shall be between 50 and 60 feet, with the optimum being 55 feet. Any deviation must meet current TERPS CAT II/III development standards, or must have a formal FS waiver to TERPS.

d. OFZ Standards. OFZs must meet the CAT II/III OFZ standards described in AC 150/5300-13.

e. Obstructions. Obstructions must not penetrate the approach light plane in accordance with Order JO 6850.2 and AC 150/5340-30.

f. Missed Approach Segment. The missed approach segment must meet the current TERPS CAT II/III development standard.

g. AJV-A Procedures. AJV-A develops these procedures in accordance with the standard TERPS CAT III development criteria and process as a part 97 SIAP.

6. Operational Approval.

a. Standard CAT III SIAP Requests. Any operator or organization can initiate requests for standard CAT III SIAPs for a specific runway.

b. Checklists. Distribution and coordination of all checklists in Appendix D is the responsibility of the assigned Flight Technologies and Procedures Division specialist. Each checklist must be completed and signed by appropriate personnel. However, further confirmation of all items on the checklists is at the discretion of the assigned Flight Technologies and Procedures Division specialist.

c. Airport Sponsor Involvement. Airport sponsor involvement (letter of concurrence) is required and must be submitted through the appropriate ADO or Airport Regional Office, as applicable. This may include the willingness to remove obstacles, provide resources such as personnel and funding, and install additional equipment such as lights, markings, signage, SMGCS implementation, etc.

d. Responsibility for Maintaining Performance Classification Standards. AJW must agree to install/adjust and maintain the facility to the required performance classification standard as described in this order and in Order 8200.1, and ensure that it meets integrity, continuity, and MTBO requirements as described in Order 6750.24 and Order JO 6750.57.

e. Flight Inspection Tolerances. The approach must be certified to CAT III flight inspection tolerances.

f. Operational Review and Approval. Operational review and approval, by the assigned Flight Technologies and Procedures Division specialist of a particular aircraft type and site-specific performance regarding “special terrain” airport runways is necessary for all CAT III minimum approvals that are predicated on the use of autoland or other FGSs (e.g., HUD) to touchdown.

g. Approach System Failures. Any failures of the instrument approach and ancillary components which support CAT III operations that would normally downgrade the system must be acted on in accordance with the procedures contained in Order 6750.24. For runways with approved takeoff minimums less than RVR 500, a GS failure should not negate the use of guided takeoff operations. An appropriate NOTAM must identify that the inoperative/unusable portion of the system does not affect takeoff operations.

h. Eligibility. Only those operators with an authorized OpSpec, MSpec, or LOA for CAT III operations using aircraft currently operationally approved for CAT III operations (i.e., autoland or HUD approved to touchdown capability) may be considered eligible for these operations.

Chapter 8. Responsibilities

1. Flight Standards Service (FS). The Flight Technologies and Procedures Division will assign a specialist with experience in All Weather Operations (AWO) to coordinate, distribute, and review all checklists. The Flight Technologies and Procedures Division specialist having assigned responsibility for the candidate airport will coordinate the procedure request with the IFP Validation Team. For CAT I RVR 1800 and RVR 1400 candidate approaches, the specialist will review proponent documentation and confirm the facility's compliance with this order. The Flight Technologies and Procedures Division ensures airport sponsor involvement (letter of concurrence) for all CAT II/III operations. The Flight Technologies and Procedures Division is also responsible for the distribution, collection, and review of the CAT II/III checklists (including SA CAT II) from AJW, Air Traffic Services (AJT), and Airports (ARP). Checklists are required any time there has been a change and/or increase in the level of service on a runway. Typically, all items must be completed on all checklists; however, the assigned Flight Technologies and Procedures Division specialist may, at his or her discretion, modify the required items. When implementing CAT II/III minimums on new or existing equipment and approaches, the assigned specialist will request that AJW set or reset the monitor alarm limits and begin the CoS evaluation in accordance with Order JO 6750.57. The Flight Technologies and Procedures Division will review each checklist for completeness and notify AJV-A that all requirements have been met. When the completed AVN checklist is returned to the Flight Technologies and Procedures Division specialist, the Flight Technologies and Procedures Division will review the completed checklists for completeness. The Flight Technologies and Procedures Division will maintain a copy of all completed checklists and a record of airport sponsor concurrence for as long as the approved procedure remains active. This requirement does not relieve AJW, AJT, and ARP from their responsibility to maintain required checklist items in accordance with this order and other applicable FAA directives as long as the approved procedure remains active. The assigned specialist will notify the Flight Technologies and Procedures Division whenever facilities are approved, modified, or deleted. The certificate management office (CMO), Flight Standards District Office (FSDO), or responsible Flight Standards office evaluates proponent requests, approves training, and amends or issues OpSpecs, MSpecs, or LOAs.

2. Instrument Flight Procedures (IFP) Validation Team. Evaluates and sets the priority for the procedure development in accordance with FAA Order 8260.43, Flight Procedures Management Program.

3. Technical Operations Services (AJW). Completes and maintains a copy of the evaluation checklist to allow assessment of runways for all CAT II and CAT III operations (including SA CAT II) and returns the completed checklist to the assigned Flight Technologies and Procedures Division specialist. Ensures that LOC and GS beam performance, monitoring limits, and shutdown delays are maintained to the required tolerances; and that critical area boundaries are defined to protect CAT II and CAT III operations. When implementing CAT II/III minimums on new or existing equipment, resets the monitor alarm limits, as appropriate, and completes the CoS evaluation in accordance with Order JO 6750.57. Establishes and maintains ILS remote status monitoring capability (for LOC, GS, and marker beacons, if applicable) at the controlling ATC location. In the event of temporary failures of the remote status indications, provides visual

monitoring and immediate notification of status changes to the controlling ATC element if personnel are available.

4. Air Traffic Organization (ATO) Air Traffic Services (AJT). Completes and maintains a copy of the evaluation checklist to assess runways for all CAT II and CAT III operations (including SA CAT II), including protection of the LOC critical area for autoland operations, and returns the completed checklist to the assigned Flight Technologies and Procedures Division specialist. Supporting the implementation of CAT II and CAT III operations ensures that the applicable procedures are adhered to and accomplished per established guidelines. This may include protection of ILS critical areas and weather reporting requirements for operating ATC towers, both Federal and non-Federal. Provides notification and training to all personnel on the new minimums or procedure. Documents agreements with the airport authority for notification of inoperative runway lights if that system does not meet standards. Upon failure of runway and approach lighting systems (whether notified by remote status monitoring capability or visual inspections), implements established procedures to advise pilots of a runway or approach lighting system failure. Ensures procedures are in place to facilitate CAT II or CAT III approach and landing operations on the procedure publication date.

5. Regional Airports Division. Completes and maintains a copy of the evaluation checklist to assess runways for all CAT II and CAT III operations (including SA CAT II) and returns the completed checklist to the assigned Flight Technologies and Procedures Division specialist. Coordinates with airport operators to evaluate applicability of CAT II and CAT III requirements such as lights, signs, markings, etc.

6. Aeronautical Information Services (AJV-A).

a. The National Flight Procedures Office (NFPO). Supports implementation of CAT II/III operations by participating in the IFP through the Flight Procedures Office (FPO). The NFPO amends the current CAT I procedure to include RVR 1800, amends the current CAT II procedure to include RVR 1000, and/or develops CAT I to RVR 1400, standard CAT II, standard CAT III, and SA CAT II procedures in accordance with the guidelines established by this order. The NFPO will develop or amend the procedure in accordance with the priority established by the IFP.

b. Flight Program Operations (AJF-0). In conjunction with the AJW organization, accomplishes the following according to the operation being evaluated:

(1) CAT I Operations to RVR 1800. Certify that the approach has no restrictions to LOC course structure and alignment or GP structure, and verify these standards on subsequent flight inspections. If the approach has restrictions, it must be approved by the Flight Technologies and Procedures Division in coordination with AJF-0 on a case-by-case basis. If the facility cannot continue to maintain the required performance, take action to restrict the facility in accordance with the standard CAT I criteria in Order 8200.1.

(2) SA CAT I Operations. Certify that the approach has no restrictions to LOC course structure and alignment or GP structure, and verify these standards on subsequent flight inspections. If the approach has restrictions, it must be approved by the Flight Technologies and

Procedures Division in coordination with AJF-0 on a case-by-case basis. If the facility cannot continue to maintain the required performance, take action to restrict the facility in accordance with the standard CAT I criteria in Order 8200.1. Also, completes the evaluation checklist to allow assessment of runways for SA CAT I operations, and returns the checklist to the FS assigned specialist.

(3) Standard CAT II Operations. Certify that the approach conforms to the applicable flight inspection-related performance requirements stated in Chapter 4, subparagraph 4a, and verify these standards on subsequent flight inspections. The GS must meet CAT II performance requirements to Point T, as specified in Order 8200.1. If the facility cannot continue to maintain the required performance, take action to restrict the facility, such as issuing NOTAMs, if the approach facility or other required equipment fails to meet its performance requirements in accordance with the standard CAT II criteria in Order 8200.1. Also, completes the evaluation checklist to allow assessment of runways for CAT II operations, and returns the checklist to the FS assigned specialist.

(4) SA CAT II Operations. Certify that the approach conforms to the applicable flight inspection-related performance requirements stated in Chapter 5, subparagraph 5a, and verify these standards on subsequent flight inspections. The GS must meet CAT II performance requirements to Point T, as specified in Order 8200.1. If the facility cannot continue to maintain the required performance, take action to restrict the facility, such as issuing NOTAMs, if the approach facility or other required equipment fails to meet its performance requirements in accordance with the standard CAT II criteria in Order 8200.1. Also, completes the evaluation checklist to allow assessment of runways for CAT II operations, and returns the checklist to the FS assigned specialist.

(5) CAT II Operations to RVR 1000. Certify that the approach conforms to the applicable flight inspection-related performance requirements stated in Chapter 6, subparagraph 4b, and verify these standards on subsequent flight inspections. The GS must meet CAT II performance requirements to Point T, as specified in Order 8200.1. If the facility cannot continue to maintain the required performance, take action to restrict the facility, such as issuing NOTAMs, if the instrument facility or other required equipment fails to meet its performance requirements in accordance with the standard CAT II criteria in Order 8200.1.

(6) Standard CAT III Operations. Certify that the approach conforms to the applicable flight inspection related performance requirements stated in Chapter 7, subparagraphs 4a and 4b, and verify these standards on subsequent flight inspections. If the facility cannot continue to maintain the required performance, take action to restrict the facility, such as issuing NOTAMs, if the approach facility or other required equipment fails to meet its performance requirements in accordance with the standard CAT III criteria in Order 8200.1. Also, completes the evaluation checklist to allow assessment of runways for CAT III operations, and returns the checklist to the FS assigned specialist.

7. Airports (ARP). The airport establishes markings and signs, and removes obstructions as necessary, to support CAT II and CAT III operations. The airport will amend the airport layout plan when necessary. The airport installs the required equipment to provide 1-second backup power to runway lighting systems. If necessary, due to equipment limitations, the airport

provides visual monitoring for lights that do not have remote monitoring. The airport provides information to the Regional Airports Division for the completion of the evaluation checklist. The airport creates a SMGCS plan and implements an approved SMGCS operation.

Appendix A. References (current editions)

1. AC 120-118, Criteria for Approval/Authorization of All Weather Operations (AWO) for Takeoff, Landing, and Rollout.
2. AC 150/5300-13, Airport Design.
3. AC 150/5340-1, Standards for Airport Markings.
4. AC 150/5340-18, Standards for Airport Sign Systems.
5. AC 150/5340-30, Design and Installation Details for Airport Visual Aids.
6. FAA Order 6560.10, Runway Visual Range (RVR).
7. FAA Order 6560.29, New Generation Runway Visual Range System.
8. FAA Order 6750.16, Siting Criteria for Instrument Landing Systems.
9. FAA Order 6750.24, Instrument Landing System and Ancillary Electronic Component Configuration and Performance Requirements.
10. FAA Order JO 6750.57, Instrument Landing System Continuity of Service Requirements and Procedures.
11. FAA Order JO 6850.2, Visual Guidance Lighting Systems.
12. FAA Order 6950.2, Electrical Power Policy Implementation at National Airspace System Facilities.
13. FAA Order JO 7110.65, Air Traffic Control.
14. FAA Order 8200.1, United States Standard Flight Inspection Manual.
15. FAA Order 8240.47, Determination of Instrument Landing System (ILS) Glidepath Angle, Reference Datum Heights (RDH), and Achieved Reference Datum Heights (ARDH).
16. FAA Order 8260.3, United States Standard for Terminal Instrument Procedures (TERPS).
17. FAA Order 8260.19, Flight Procedures and Airspace.
18. FAA Order 8260.43, Flight Procedures Management Program.
19. Flight Operations Group web page at https://www.faa.gov/about/office_org/headquarters_offices/avs/offices/afx/afs/afs400/afs410/.

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Appendix A

20. Flight Procedures and Airspace Group web page at
https://www.faa.gov/about/office_org/headquarters_offices/avs/offices/afx/afs/afs400/afs420/.

21. ICAO Annex 10, Aeronautical Telecommunications.

Appendix B. Abbreviations and Acronyms

A/FD	Airport/Facility Directory
AC	Advisory Circular
ADO	Airport District Office
AJV-A	Aeronautical Information Services
AJW	Technical Operations Services
ALSF	Approach Lighting System With Sequenced Flashing Lights
AP	Autopilot
ARDH	Achieved Reference Datum Height
ARP	Airports
ATC	Air Traffic Control
ATCT	Airport Traffic Control Tower
ATIS	Automatic Terminal Information Service
ATO	Air Traffic Organization
AVN	Aviation System Standards
AWO	All Weather Operations
CAT	Category
CFR	Code of Federal Regulations
CL	Centerline
CMO	Certificate Management Office
CoS	Continuity of Service
DA	Decision Altitude
DH	Decision Height
FAA	Federal Aviation Administration
FD	Flight Director
FGS	Flight Guidance System
FPO	Flight Procedures Office
FS	Flight Standards Service
FSDO	Flight Standards District Office
FSIMS	Flight Standards Information Management System
GBAS	Ground Based Augmentation System
GLS	GBAS Landing System
GP	Glide Path
GS	Glideslope
HAT	Height Above Touchdown
HIRL	High Intensity Runway Lights
HUD	Head-Up Display
IAP	Instrument Approach Procedure

ICAO	International Civil Aviation Organization
IFP	Instrument Flight Procedures
ILS	Instrument Landing System
IM	Inner Marker
LOA	Letter of Authorization
LOC	Localizer
LPV	Localizer Performance with Vertical Guidance
MALSR	Medium Intensity Approach Lighting System with Runway Alignment Indicator Lights
MM	Middle Marker
MSpec	Management Specification
MTBO	Mean Time Between Outages
NAS	National Airspace System
NAVAID	Navigational Aid
NCP	NAS Change Proposal
NFPO	National Flight Procedures Office
NOTAM	Notice to Airmen
OFZ	Obstacle Free Zone
OM	Outer Marker
OpSpec	Operations Specification
RA	Radio Altimeter
RA NA	Radar Altimeter Minimums Not Authorized
RCL	Runway Centerline
RDH	Reference Datum Height
RGL	Runway Guard Light
RVR	Runway Visual Range
SA	Special Authorization
SIAP	Standard Instrument Approach Procedure
SMGCS	Surface Movement Guidance and Control System
SSALR	Simplified Short Approach Lighting System with Runway Alignment Indicator Lights
TCH	Threshold Crossing Height
TDZ	Touchdown Zone
TERPS	Terminal Instrument Procedures

**Appendix C. Sample Checklists for Evaluating Ground Facilities for
SA CAT II Operations**

The basis of approval for airports having instrument landing system (ILS) ground facilities for Special Authorization (SA) Category (CAT) II operations is contained in the following checklists.

The assigned Flight Technologies and Procedures Division (AFS-400) representative will coordinate the checklists. Sample checklists for Technical Operations Services (AJW), Air Traffic Services (AJT), Airports (ARP), and Flight Program Operations (AJF-0) are provided.

Evaluation of the ILS Type _____ equipment for Runway _____ at _____			
AIRPORT		CITY	STATE
to determine its capability to provide CAT II approach and landing minimums.			
Date requested:			
Requested by:			
Airport Manager's concurrence obtained: <input type="checkbox"/> Yes <input type="checkbox"/> No			
CAT II minimum:	DH	HAT	RVR
Procedure was coordinated with the IFP Validation Team: <input type="checkbox"/> Yes <input type="checkbox"/> No			
All checklists are signed and all discrepancies have been resolved: <input type="checkbox"/> Yes <input type="checkbox"/> No			
CAT II flight inspection completed satisfactorily: <input type="checkbox"/> Yes <input type="checkbox"/> No			
CAT II minimum:	DH	HAT	RVR
Comments:			
Target dates for attainment of Continuity of Service (CoS) and 14 CFR part 97 publication:			
CAT II CoS:		Target Publication Date:	

Assigned AFS-400 Member (Print)

Signature

Date

COORDINATION WITH THE FOLLOWING OFFICES:

	DATES		
OFFICE	PROVIDED	RETURNED	OK?
Technical Operations Services (AJW):			
Discrepancies/Comments:			
Resolution:			
Air Traffic Services (AJT):			
Discrepancies/Comments:			
Resolution:			
Airports (ARP):			
Discrepancies/Comments:			
Resolution:			

Technical Operations Checklist for SA CAT II Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to provide Class II/D/2 performance in support of the proposed SA CAT II approach and landing operations.

CAT II RVR 1600 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT II RVR 1200 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No
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Confirm that all ground system requirements in FAA Order 8400.13, Chapter 5, SA CAT II Approach Operations, applicable to AJW are met. Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II service to the users. Once approval is granted, the Flight Standards Service (FS) will issue authorization for CAT II operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your CAT II/III coordinator for monitoring the accomplishment of your checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

Please set monitor alarms to CAT II tolerances and initiate CoS.

II. General Data.

A. Facility ID: _____
B. Glideslope (GS) Angle: _____ degrees.
C. Published Threshold Crossing Height (TCH): _____ feet.
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

III. ILS Systems. (Ref. AC 120-118 and Order 6750.24.)

A. Localizer (LOC) and GS equipment and array type (e.g., Mark 20 and 14 element, capture-effect, etc.)
(1) LOC/array type: _____
(2) GS equipment type: _____
(3) Far Field Monitor installed (not required): <input type="checkbox"/> Yes <input type="checkbox"/> No

B. Facility is certified for and capable of maintaining a performance classification of at least Class II/D/2 (Ref. Order 6750.24)..... <input type="checkbox"/> Yes <input type="checkbox"/> No		
CAT II Monitor Start Date: _____		CAT II Flight Inspection Date: _____
Estimated CoS Start Date: _____		Estimated CoS Completion Date: _____
Commencement/Completion of CoS burn-in is not a prerequisite for checklist signature. If procedure charts prior to CoS requirements being met, a Notice to Airmen (NOTAM) must be published to N/A the procedure until burn-in is complete.		
C. Remote Status Monitors (LOC/GS) (Ref. Order 6750.16) <input type="checkbox"/> Yes <input type="checkbox"/> No		
Location(s):	LOC: _____	GS: _____
D. Marker Beacons: (Ref. Order 6750.16)		
(1) Outer Marker (OM) installed (not required):		<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) Middle Marker (MM) installed (not required):		<input type="checkbox"/> Yes <input type="checkbox"/> No
(3) Inner Marker (IM) installed (for "RA NA" operations):		<input type="checkbox"/> Yes <input type="checkbox"/> No
E. Approach Light System (MALSR, SSALR, or ALSF-1/2; Ref. Order JO 6850.2) installed: <input type="checkbox"/> Yes <input type="checkbox"/> No		
(1) Monitored (Ref. Order 6750.24):		<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) Green threshold bar installed:.....		<input type="checkbox"/> Yes <input type="checkbox"/> No
(3) Approach light system mounted on frangible fixtures:		<input type="checkbox"/> Yes <input type="checkbox"/> No
Submit Approach Light System Plan and Profile as-built drawings to the assigned AFS-400 member for forwarding to Aeronautical Information Services (AJV) if applicable to the project.		
F. The LOC and GS critical areas are adequate to support CAT II/III operations: <input type="checkbox"/> Yes <input type="checkbox"/> No		
(1) Are the LOC and GS critical areas standard (Ref. Order 6750.16)?		<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) If critical areas are nonstandard, provide a description and attach critical area drawings:		
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:		

IV. Runway Visual Range (RVR) Equipment. RVR 1600, one sensor required; RVR 1200, two sensors required; runway exceeding 8000 feet and RVR below 1600 requires midpoint RVR in addition to touchdown zone (TDZ) and rollout; CAT III operations, three sensors required. (Ref. Orders 6750.24 and 6560.10.)

A. Installed in accordance with Order 6560.29:	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Type equipment (Make/Model):	
(1) Touchdown installed:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) Midpoint installed:.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
(3) Rollout installed:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(4) Far-End installed (not required):	<input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

V. Electrical Power Requirements. Indicate whether the following components meet CAT II standards for backup power and power transfer (Ref. Order 6950.2). (Enter “NA” if not installed.)

A. LOC.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. GS	<input type="checkbox"/> Yes <input type="checkbox"/> No
C. OM.....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
D. MM	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
E. IM.....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
F. RVR (Touchdown).....	<input type="checkbox"/> Yes <input type="checkbox"/> No
G. RVR (Midpoint).....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
H. RVR (Rollout).....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
I. ALSF-1/2, SSALR, MALSR	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VI. Siting Standards. Confirm the following Navigational Aids (NAVAID) meet siting standards (Ref. Order 6750.16):

LOC Antenna: <input type="checkbox"/> Yes <input type="checkbox"/> No	GS Mast/Antenna: <input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VII. Additional Information:

A. List all approved and pending National Airspace System (NAS) Change Proposals (NCP) applicable to the facilities in this checklist (ILS, approach lights, RVR, etc.):
B. Indicate the AJW Systems Support Center and hours of coverage for qualified technicians on duty at the airport for this system:

Category II/III Coordinator (Print)	Signature	Date

Manager or Authorized Representative, Service Area Operations Engineering Group (Print)	Signature	Date

ATO AJT Checklist for SA CAT II Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to provide the proposed CAT II approach and landing operations.

CAT II RVR 1600:	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT II RVR 1200:	<input type="checkbox"/> Yes <input type="checkbox"/> No
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Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II service to the users. Once approval is granted, FS will issue authorization for CAT II operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your staff member/point of contact for monitoring the accomplishment of your checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

II. Category II ILS Operational Requirements: (Ref. Order JO 7210.3)

A. Letter of Agreement coordinated with the appropriate offices (i.e., AJW, ARP Division/District Office, FS, and Airport Authority). (Please attach copy). <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II operations and any planned equipment changes necessary for CAT II operations:

III. Monitor Capability and Coordination. (Ref. Order 6750.24):

A. Verify that monitoring capability exists in the Airport Traffic Control Tower (ATCT) for:
(1) Localizer (LOC): <input type="checkbox"/> Yes <input type="checkbox"/> No
(2) Glideslope (GS): <input type="checkbox"/> Yes <input type="checkbox"/> No
(3) Inner Marker (IM) (for RA NA operations): <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
B. Arrangements exist for airport personnel to advise ATCT whenever the runway lighting system does not meet CAT II requirements: <input type="checkbox"/> Yes <input type="checkbox"/> No
C. Is an approved electrical monitoring system installed in the ATCT for the approach light system? <input type="checkbox"/> Yes <input type="checkbox"/> No

This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

IV. Power Transfer. (Ref. Order 6750.24):

A. Arrangements exist to start engine generators for:
(1) RVR: <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
(2) Runway Lights (check all that apply): <input type="checkbox"/> HIRL <input type="checkbox"/> TDZ <input type="checkbox"/> RCL <input type="checkbox"/> None
(3) Approach light system and power vault (if ALSF installed): <input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

V. Communications.

A. Positive Control of Aircraft and Ground Vehicles on Runway and ILS Critical Areas (Ref. AC 120-118, AC 150/5340-1, and Order JO 7110.65): <input type="checkbox"/> Yes <input type="checkbox"/> No
B. Indicate how facility outages and airport conditions (Ref. Orders JO 7110.65 and JO 7210.3) are reported (ATIS, NOTAM, etc.):..... _____
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

Facility Air Traffic Manager or Authorized Representative (Print)	Signature	Date
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Airports Division Checklist for Special Authorization CAT II Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to support the proposed CAT II approach and landing operations.

CAT II RVR 1600:	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT II RVR 1200:	<input type="checkbox"/> Yes <input type="checkbox"/> No
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Confirm that all ground systems and obstacle clearance requirements are met. Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II service to the users. Once approval is granted, FS will issue authorization for CAT II operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your staff member/point of contact for monitoring the accomplishment of the checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

II. Lighting Aids. Indicate if the following visual aids meet installation standards. If a modification to an airport design standard was approved, list each approval in section VII. (Ref. AC 150/5340-30 and Order JO 6850.2)

A. High Intensity Runway Edge Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Threshold/Runway End Lights (in addition to threshold lights, which are integral to the approach light system):	<input type="checkbox"/> Yes <input type="checkbox"/> No
C. Runway Centerline (RCL) Lights (not required):	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
D. Runway Touchdown Zone (TDZ) Lights (not required):	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
E. Approach Lights (MALSR, SSALR, or ALSF-1/2) (if non-Federal):	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA

This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

III. Monitoring of Lighting Aids. (Ref. Order 6750.24)

A. Arrangements for airport personnel to advise ATCT whenever the runway lighting system does not meet CAT II requirements:		<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Specify the organization responsible for remote monitoring or visual inspection of lighting components. Enter "none" if not installed:		
Component	Remote Monitor	Visual Inspection
(1) Runway Edge Lights:		
(2) RCL Lights:		
(3) Runway TDZ Lights:		
(4) Approach Lights (if non-Federal):		
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:		

IV. Surface Markings and Signs Installed. (Ref. AC 150/5340-1, AC 150/5340-18, Order 6750.16, and Order JO 7110.65)

A. Precision Instrument Runway Markings:		<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Runway Holding Position Markings and Signs:		<input type="checkbox"/> Yes <input type="checkbox"/> No
C. CAT II ILS Critical Areas Identified. ILS Critical Area Holding Position Markings and Signs:		<input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:		

V. Obstacle Clearance. Certification may be obtained from the airport sponsor.

A. Is the CAT II Obstacle Free Zone (OFZ) clear of obstructions?	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. If no, describe any obstacles that penetrate the CAT II OFZ:	
C. Approach Light Area:	
(1) Approach light plane clear:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) If light plane is not clear, describe any penetrations:	
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VI. Electrical Power Requirements. (Ref. Order 6950.2 and AC 150/5340-30) Verify that the following components, if installed, meet the requirement for 1-second power transfer:

A. Threshold and Runway Edge Lights:.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. RCL Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
C. TDZ Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
D. Approach Lights (if non-Federal):	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VII. National Standards. List all approved and planned modifications to airport national design standards regarding the proposed runway and equipment, including those related to facility frangibility:

**Manager or Authorized
Representative, ADO (Print)**

Signature

Date

**Manager or Authorized
Representative,
Airports Division (Print)**

Signature

Date

AVN ILS CAT Checklist

The designated ILS system has been selected for use to higher standards than a standard CAT I system. The attached checklist is designed to provide the appropriate organizations with the necessary information that will allow them to determine whether to grant or deny this higher service. We must confirm that all ground system and obstacle clearance requirements contained in FAA Order 8400.13 are met.

The following blocks are graduated into increasing degrees of higher standards. All blocks previous to the requested standard must be completed.

- Block I, General Data.
- Block II, Special Authorization CAT I Operations (latest version of FAA Order 8400.13, Chapter 3).
- Block III, Special Authorization CAT II Operations (latest version of FAA Order 8400.13, Chapter 5).
- Block IV, CAT II Tolerances Met (latest version of FAA Order 8200.1, Chapter 15).
- Block V, CAT III Tolerances Met (latest version of FAA Order 8200.1, Chapter 15).

Completion of this checklist should reflect achieved/completed status—not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, the checklist will be forwarded to the appropriate FS manager via the Aircraft System Standards (AVN) to preclude the delay of the requested service to the users.

Please provide the following information.

I.	General Data	
A	Location:	
B	Airport:	
C	Runway Number:	
D	Facility ID:	
E	Runway Length (ft.) / Width (ft.):	/
F	Runway Gradient % +/-:	
G	Runway Surface Type:	
H	Runway Grooving:	
I	Glideslope (GS) Angle (degrees):	
J	Requested Standard (<i>II thru V</i>):	

II.	Special Authorization CAT I Operations	
A	Localizer (LOC) #1 Performance Classification:	
B	Radio Altimeter (RA) Setting Height:	
C	GS Clearance Below Path:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
D	Missed Approach:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
E	MALS or Better:	<input type="checkbox"/> Yes <input type="checkbox"/> No

III. Special Authorization CAT II Operations		
A	LOC #1 (CAT II/D Minimum):	
B	LOC Performance Classification:	
C	GS #1 (CAT II Criteria):	
D	RA Setting Height:	
E	RDH Crossing Height:	
F	ARDH Crossing Height:	
G	CAT II ILS SIAP:	<input type="checkbox"/> Yes <input type="checkbox"/> No
H	Missed Approach:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
I	MALS or Better:	<input type="checkbox"/> Yes <input type="checkbox"/> No

*NOTE: If dual transmitter, complete section IV, rows A & B below.

IV. CAT II Tolerances Met		
A	LOC #2 (CAT II/D Minimum):	
B	GS #2 (CAT II Criteria):	
C	ALSF-2 Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No

V. CAT III Tolerances Met		
A	LOC #1 (CAT III/D or III/E Minimum):	<input type="checkbox"/> III/D <input type="checkbox"/> III/E
B	LOC #2 (CAT III/D or III/E Minimum):	<input type="checkbox"/> III/D <input type="checkbox"/> III/E
C	CAT III SIAP:	<input type="checkbox"/> Yes <input type="checkbox"/> No

Remarks:

<i>POSITION</i>	<i>DATE</i>	<i>SIGNATURE</i>
Chief of Flight Inspection Activity		
Operations ILS Category Coordinator		

**Appendix D. Sample Checklists for Evaluating Ground Facilities for
CAT II and CAT III Operations**

The basis of approval for airports having instrument landing system (ILS) ground facilities for Category (CAT) II and CAT III operations is contained in the following checklists.

The assigned Flight Technologies and Procedures Division (AFS-400) representative will coordinate the checklists. Sample checklists for Technical Operations Services (AJW), Air Traffic Services (AJT), Airports (ARP), and Flight Program Operations (AJF-0) are provided.

Evaluation of the ILS Type _____ equipment for Runway _____ at _____			
AIRPORT _____		CITY _____	STATE _____
to determine its capability to provide CAT II and/or CAT III approach and landing minimums.			
Date requested:			
Requested by:			
Airport Manager's concurrence obtained: <input type="checkbox"/> Yes <input type="checkbox"/> No			
Procedure was coordinated with the IFP Validation Team: <input type="checkbox"/> Yes <input type="checkbox"/> No			
All checklists are signed and all discrepancies have been resolved: <input type="checkbox"/> Yes <input type="checkbox"/> No			
CAT II/III flight inspection completed satisfactorily: <input type="checkbox"/> Yes <input type="checkbox"/> No			
CAT II minimum:	DH	HAT	RVR
Approved for RVR 1000 autoland or HUD minimums?			<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT III minimum:	DH	RVR	
Comments:			
Target dates for attainment of Continuity of Service (CoS) and 14 CFR part 97 publication:			
CAT II CoS:		Target Publication Date:	
CAT III CoS:		Target Publication Date:	

Assigned AFS-400 Member (Print) Signature

Date

COORDINATION WITH THE FOLLOWING OFFICES:

	DATES		
OFFICE	PROVIDED	RETURNED	OK?
Technical Operations Services (AJW):			
Discrepancies/Comments:			
Resolution:			
Air Traffic Services (AJT):			
Discrepancies/Comments:			
Resolution:			
Airports (ARP):			
Discrepancies/Comments:			
Resolution:			
<u>AVIATION SYSTEM STANDARDS:</u>			
Flight Program Operations (AJF-0):			
Discrepancies/Comments:			
Resolution:			
Aircraft Operations (AJF-1000):			
Discrepancies/Comments:			
Resolution:			

Technical Operations Checklist for CAT II/III Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to provide the required performance in support of the proposed CAT II/III approach and landing operations.

CAT II RVR 1600 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 700 (III/D/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1200 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 600 (III/E/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1000 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 300 (III/E/4):	<input type="checkbox"/> Yes <input type="checkbox"/> No

Confirm that all ground system requirements in Order 8400.13 applicable to AJW are met. Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II/III service to the users. Once approval is granted, the Flight Standards Service (FS) will issue authorization for CAT II/III operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your CAT II/III coordinator for monitoring the accomplishment of your checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

Please set monitor alarms to CAT II tolerances and initiate CoS.

II. General Data.

A. Facility ID: _____
B. Glideslope (GS) Angle: _____ degrees.
C. Published Threshold Crossing Height (TCH): _____ feet.
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

III. ILS Systems. (Ref. AC 120-118 and Order 6750.24.)

A. Localizer (LOC) and GS equipment and array type (e.g., Mark 20 and 14 element, capture-effect, etc.)
(1) LOC/array type: _____
(2) GS equipment type: _____

(3) Far Field Monitor installed:..... <input type="checkbox"/> Yes <input type="checkbox"/> No	
B. Facility is certified for and capable of maintaining the required performance classification (Ref. Order 6750.24) <input type="checkbox"/> II/D/2 <input type="checkbox"/> III/D/3 <input type="checkbox"/> III/E/3 <input type="checkbox"/> III/E/4 <input type="checkbox"/> No	
(1) Facility certified and maintained to CAT II or CAT III <input type="checkbox"/> CAT II <input type="checkbox"/> CAT III <input type="checkbox"/> No	
CAT II/III Monitor Start Date: _____	CAT II/III Flight Inspection Date: _____
Estimated CoS Start Date: _____	Estimated CoS Completion Date: _____
Commencement/Completion of CoS burn-in is not a prerequisite for checklist signature. If procedure charts prior to CoS requirements being met, a Notice to Airmen (NOTAM) must be published to N/A the procedure until burn-in is complete.	
C. Remote Status Monitors (LOC/GS) (Ref. Order 6750.16) <input type="checkbox"/> Yes <input type="checkbox"/> No	
Location(s):	LOC: _____ GS: _____
D. Marker Beacons: (Ref. Order 6750.16)	
(1) Outer Marker (OM) installed (not required): <input type="checkbox"/> Yes <input type="checkbox"/> No	
(2) Middle Marker (MM) installed (not required): <input type="checkbox"/> Yes <input type="checkbox"/> No	
(3) Inner Marker (IM) installed (for "RA NA" CAT II operations): <input type="checkbox"/> Yes <input type="checkbox"/> No	
E. Approach Light System (Ref. Order JO 6850.2) installed:..... <input type="checkbox"/> Yes <input type="checkbox"/> No	
(1) Monitored (Ref. Order 6750.24)?..... <input type="checkbox"/> Yes <input type="checkbox"/> No	
Submit Approach Light System Plan and Profile as-built drawings to the assigned AFS-400 member for forwarding to Aeronautical Information Services (AJV) if applicable to the project.	
F. The LOC and GS critical areas are adequate to support CAT II/III operations: <input type="checkbox"/> Yes <input type="checkbox"/> No	
(1) Are the LOC and GS critical areas standard (Ref. Order 6750.16)? <input type="checkbox"/> Yes <input type="checkbox"/> No	
(2) If critical areas are nonstandard, provide a description and attach critical area drawings:	
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

IV. Runway Visual Range (RVR) Equipment. RVR 1600, one sensor required; RVR 1200, two sensors required; runway exceeding 8000 feet and RVR below 1600 requires midpoint RVR in addition to touchdown zone (TDZ) and rollout; CAT III operations, three sensors required. (Ref. Orders 6750.24 and 6560.10.)

A. Installed in accordance with Order 6560.29:	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Type equipment (Make/Model):	
(1) Touchdown installed:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) Midpoint installed:.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
(3) Rollout installed:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(4) Far-End installed (not required):	<input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

V. Electrical Power Requirements. Indicate whether the following components meet CAT II standards for backup power and power transfer (Ref. Order 6950.2). (Enter “NA” if not installed.)

A. LOC.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. GS	<input type="checkbox"/> Yes <input type="checkbox"/> No
C. OM.....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
D. MM	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
E. IM.....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
F. RVR (Touchdown).....	<input type="checkbox"/> Yes <input type="checkbox"/> No
G. RVR (Midpoint).....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
H. RVR (Rollout).....	<input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA
I. ALSF-1/2	<input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VI. Siting Standards. Confirm the following Navigational Aids (NAVAID) meet siting standards (Ref. Order 6750.16):

LOC Antenna: <input type="checkbox"/> Yes <input type="checkbox"/> No	GS Mast/Antenna: <input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:	

VII. Additional Information:

A. List all approved and pending National Airspace System (NAS) Change Proposals (NCP) applicable to the facilities in this checklist (ILS, approach lights, RVR, etc.):
B. Indicate the AJW Systems Support Center and hours of coverage for qualified technicians on duty at the airport for this system:

Category II/III Coordinator (Print)	Signature	Date

Manager or Authorized Representative, Service Area Operations Engineering Group (Print)	Signature	Date

ATO AJT Checklist for CAT II/III Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to provide the proposed CAT II/III approach and landing operations.

CAT II RVR 1600 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 700 (III/D/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1200 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 600 (III/E/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1000 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 300 (III/E/4):	<input type="checkbox"/> Yes <input type="checkbox"/> No

Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II/III service to the users. Once approval is granted, FS will issue authorization for CAT II/III operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your staff member/point of contact for monitoring the accomplishment of your checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

II. CAT II/III Operational Requirements. (Ref. Order JO 7210.3):

<p>A. Letter of Agreement coordinated with the appropriate offices (i.e., AJW, ARP Division/District Office, FS, and Airport Authority). Please attach copy: <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>

III. Monitor Capability and Coordination. (Ref. Order 6750.24):

<p>A. Verify that monitoring capability exists in the Airport Traffic Control Tower (ATCT) for:</p>
<p>(1) Localizer (LOC): <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>(2) Glideslope (GS): <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>(3) Inner Marker (IM) (for RA NA operations): <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA</p>
<p>B. Is an approved electrical monitoring system installed in the ATCT for the runway light system? <input type="checkbox"/> Yes <input type="checkbox"/> No</p>

<p>C. Is an approved electrical monitoring system installed in the ATCT for the approach light system? <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>

IV. Power Transfer. (Ref. Order 6750.24):

<p>A. Arrangements exist to start engine generators for:</p>
<p>(1) RVR: <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> NA</p>
<p>(2) Runway Lights (check all that apply): <input type="checkbox"/> HIRL <input type="checkbox"/> TDZ <input type="checkbox"/> RCL <input type="checkbox"/> None</p>
<p>(3) Approach light system and power vault (if ALSF installed): <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>

V. Communications.

<p>A. Positive Control of Aircraft and Ground Vehicles on Runway and ILS Critical Areas (Ref. AC 120-118, AC 150/5340-1, and Order JO 7110.65)..... <input type="checkbox"/> Yes <input type="checkbox"/> No</p>
<p>B. Indicate how facility outages and airport conditions (Ref. Orders JO 7110.65 and JO 7210.3) are reported (ATIS, NOTAM, etc.):..... _____</p>
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>

Facility Air Traffic Manager or Authorized Representative (Print)	Signature	Date

Airports Division Checklist for Special Authorization CAT II Operations

Runway: _____ Airport: _____ City: _____ State: _____

This checklist is to verify that the equipment for the runway listed above meets the requirements to support the proposed CAT II/III approach and landing operations.

CAT II RVR 1600 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 700 (III/D/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1200 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 600 (III/E/3):	<input type="checkbox"/> Yes <input type="checkbox"/> No
CAT II RVR 1000 (II/D/2):	<input type="checkbox"/> Yes <input type="checkbox"/> No	CAT III RVR 300 (III/E/4):	<input type="checkbox"/> Yes <input type="checkbox"/> No

Confirm that all ground systems and obstacle clearance requirements are met. Completion of this checklist should reflect achieved/completed status, not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, please return the checklist expeditiously to the assigned AFS-400 member in order to preclude delay of CAT II/III service to the users. Once approval is granted, FS will issue authorization for CAT II/III operations.

I. General Information. Immediately upon initiation of this checklist, please provide the assigned AFS-400 member (listed below) with the name and telephone number of your staff member/point of contact for monitoring the accomplishment of the checklist.

AFS-400 Member: _____	Phone Number: _____
Alternate: _____	Phone Number: _____

II. Lighting Aids. Indicate if the following visual aids meet installation standards. If a modification to an airport design standard was approved, list each approval in section VII. (Ref. AC 150/5340-30 and Order JO 6850.2.)

A. High Intensity Runway Edge Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Threshold/Runway End Lights (in addition to threshold lights, which are integral to the approach light system):	<input type="checkbox"/> Yes <input type="checkbox"/> No
C. Runway Centerline (RCL) Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
D. Runway Touchdown Zone (TDZ) Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
E. ALSF-2 Approach Lights (if non-Federal):	<input type="checkbox"/> Yes <input type="checkbox"/> No

NOTE: For authorization less than RVR 1200, include a copy of the Surface Movement Guidance and Control System (SMGCS) plan and taxi chart with details of all required lighting aids (taxiway centerline (CL) lights, stop bars, etc.).

This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:

III. Monitoring of Lighting Aids. (Ref. Order 6750.24.)

A. Arrangements for airport personnel to advise ATCT whenever the runway lighting system does not meet CAT II/III requirements:		<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Specify the organization responsible for remote monitoring and visual inspection of lighting components. Enter "none" if not installed:		
<u>Component</u>	<u>Remote Monitor</u>	<u>Visual Inspection</u>
(1) Runway Edge Lights:		
(2) RCL Lights:		
(3) Runway TDZ Lights:		
(4) Approach Lights (if non-Federal):		
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:		

IV. Surface Markings and Signs Installed. (Ref. AC 150/5340-1, AC 150/5340-18, Order JO 7110.65, and Order 6750.16)

A. Precision Instrument Runway Markings:		<input type="checkbox"/> Yes <input type="checkbox"/> No
B. Runway Holding Position Markings and Signs:		<input type="checkbox"/> Yes <input type="checkbox"/> No
C. CAT II/III ILS Critical Areas Identified. ILS Critical Area Holding Position Markings and Signs:		<input type="checkbox"/> Yes <input type="checkbox"/> No
This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:		

V. Obstacle Clearance. Certification may be obtained from the airport sponsor.

A. Is the CAT II/III Obstacle Free Zone (OFZ) clear of obstructions?		<input type="checkbox"/> Yes <input type="checkbox"/> No
B. If no, describe any obstacles that penetrate the CAT II/III OFZ:		

C. Approach Light Area:	
(1) Approach light plane clear:	<input type="checkbox"/> Yes <input type="checkbox"/> No
(2) If light plane is not clear, describe any penetrations:	
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>	

VI. Electrical Power Requirements. (Ref. Order 6950.2.) Verify that the following components, if installed, meet the requirement for 1-second power transfer:

A. Threshold and Runway Edge Lights:.....	<input type="checkbox"/> Yes <input type="checkbox"/> No
B. RCL Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
C. TDZ Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No
D. Approach Lights (if non-Federal):	<input type="checkbox"/> Yes <input type="checkbox"/> No
<p>This checklist should reflect current equipment. Describe any known deficiencies in this equipment that would affect potential CAT II-III operations and any planned equipment changes necessary for CAT II-III operations:</p>	

VII. National Standards. List all approved and planned modifications to airport national design standards regarding the proposed runway and equipment, including those related to facility frangibility:

**Manager or Authorized
Representative, ADO (Print)**

Signature

Date

**Manager or Authorized
Representative,
Airports Division (Print)**

Signature

Date

AVN ILS CAT Checklist

The designated ILS system has been selected for use to higher standards than a standard CAT I system. The attached checklist is designed to provide the appropriate organizations with the necessary information that will allow them to determine whether to grant or deny this higher service. We must confirm that all ground system and obstacle clearance requirements contained in FAA Order 8400.13 are met.

The following blocks are graduated into increasing degrees of higher standards. All blocks previous to the requested standard must be completed.

- Block I, General Data.
- Block II, Special Authorization CAT I Operations (latest version of FAA Order 8400.13, Chapter 3).
- Block III, Special Authorization CAT II Operations (latest version of FAA Order 8400.13, Chapter 5).
- Block IV, CAT II Tolerances Met (latest version of FAA Order 8200.1, Chapter 15).
- Block V, CAT III Tolerances Met (latest version of FAA Order 8200.1, Chapter 15).

Completion of this checklist should reflect achieved/completed status—not planned actions. The checklist can be completed with items still in progress at the discretion of the assigned AFS-400 member. When all portions of this checklist are complete, the checklist will be forwarded to the appropriate FS manager via the Aircraft Systems Standard (AVN) to preclude the delay of the requested service to the users.

Please provide the following information.

I.	General Data	
A	Location:	
B	Airport:	
C	Runway Number:	
D	Facility ID:	
E	Runway Length (ft.) / Width (ft.):	/
F	Runway Gradient % +/-:	
G	Runway Surface Type:	
H	Runway Grooving:	
I	Glideslope (GS) Angle (degrees):	
J	Requested Standard (<i>II thru V</i>):	

II.	Special Authorization CAT I Operations	
A	Localizer (LOC) #1 Performance Classification:	
B	Radio Altimeter (RA) Setting Height:	
C	GS Clearance Below Path:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
D	Missed Approach:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
E	MALSR or Better:	<input type="checkbox"/> Yes <input type="checkbox"/> No

III. Special Authorization CAT II Operations		
A	LOC #1 (CAT II/D Minimum):	
B	LOC Performance Classification:	
C	GS #1 (CAT II Criteria):	
D	RA Setting Height:	
E	RDH Crossing Height:	
F	ARDH Crossing Height:	
G	CAT II ILS SIAP:	<input type="checkbox"/> Yes <input type="checkbox"/> No
H	Missed Approach:	<input type="checkbox"/> Sat <input type="checkbox"/> Unsat
I	MALS or Better:	<input type="checkbox"/> Yes <input type="checkbox"/> No

*NOTE: If dual transmitter, complete section IV, rows A & B below.

IV. CAT II Tolerances Met		
A	LOC #2 (CAT II/D Minimum):	
B	GS #2 (CAT II Criteria):	
C	ALSF-2 Lights:	<input type="checkbox"/> Yes <input type="checkbox"/> No

V. CAT III Tolerances Met		
A	LOC #1 (CAT III/D or III/E Minimum):	<input type="checkbox"/> III/D <input type="checkbox"/> III/E
B	LOC #2 (CAT III/D or III/E Minimum):	<input type="checkbox"/> III/D <input type="checkbox"/> III/E
C	CAT III SIAP:	<input type="checkbox"/> Yes <input type="checkbox"/> No

Remarks:

<i>POSITION</i>	<i>DATE</i>	<i>SIGNATURE</i>
Chief of Flight Inspection Activity		
Operations ILS Category Coordinator		

Directive Feedback Information

Please submit any written comments or recommendation for improving this directive, or suggest new items or subjects to be added to it. Also, if you find an error, please tell us about it.

Subject: FAA Order 8400.13F, Procedures for the Evaluation and Approval of Facilities for Special Authorization Category I Operations and All Category II and III Operations

To: Flight Standards Directive Management Officer, AFB-120 Directives Mailbox
(9-AWA-AFB-120-Directives@faa.gov)

(Please check all appropriate line items)

An error (procedural or typographical) has been noted in paragraph _____ on page _____ .

Recommend paragraph _____ on page _____ be changed as follows: *(attach separate sheet if necessary)*

In a future change to this order, please cover the following subject:
(briefly describe what you want added)

Other comments:

I would like to discuss the above. Please contact me.

Submitted by: _____ Date: _____

Telephone Number: _____ Routing Symbol: _____