

SECTION 2

FATIGUE MITIGATION REGULATIONS

The following is an amended version of the recently published Federal Aviation Regulations, dated December 21, 2011. The subject matter is Flightcrew Member Duty and Rest Requirements. The principal changes to the Final Rule are:

- Elimination of the “Cargo Carve-out” provisions
- Elimination of the FRMS concept
- Enhanced sensitivity to operating within the “Window Of Circadian Low”
- Inclusion of deadhead transportation in the flight duty period
- “Whistleblower protection” for flightcrew members self-assessing too fatigued to accept or continue an assignment
- Fatigue mitigation for short, dual rest (18-33 hour) periods
- Non-applicability of domestic augmentation
- Non-applicability of split-sleep for passenger operations
- Limitations on reserve availability period shifting
- 12-18 hour report time for “long-call” reserve
- Inclusion of 7 day flight time limitations

Exclusions are in *italicized, red strikethrough* font. Additions/substitutions are in **blue font**.

For a discussion on the various changes to the “Final Rule,” please see Appendix B, of the “Fair Treatment of Experienced Pilots Act - Part 2.”

List of Subjects

14 CFR Part 117

Airmen, Aviation safety, Reporting and recordkeeping requirements, Safety.

14 CFR Part 119

Air carriers, Aircraft, Aviation safety, Reporting and recordkeeping requirements.

14 CFR Part 121

Air carriers, Aircraft, Airmen, Aviation safety, Reporting and recordkeeping requirements, Safety.

The Amendment

In consideration of the foregoing, the Federal Aviation Administration amends chapter I of title 14, Code of Federal Regulations as follows:

1. Part 117 is added to read as follows:

PART 117—FLIGHT AND DUTY LIMITATIONS AND REST REQUIREMENTS: FLIGHTCREW MEMBERS

Sec.

117.1 Applicability.

117.3 Definitions.

117.5 Fitness for duty.

~~117.7 Fatigue risk management system.~~ OMITTED.

117.9 Fatigue education and awareness training program.

117.11 Flight time limitation.

117.13 Flight duty period: Unaugmented operations.

117.15 Flight duty period: Split duty.

117.17 Flight duty period: Augmented flightcrew.

117.19 Flight duty period extensions.

117.21 Reserve status.

117.23 Cumulative limitations.

117.25 Rest period.

117.27 Consecutive nighttime operations.

117.29 Emergency and government sponsored operations.

Table A to Part 117 – Maximum Flight Time Limits for Unaugmented Operations

Table B to Part 117 – Flight Duty Period: Unaugmented Operations

Table C to Part 117 – Flight Duty Period: Augmented Operations

§ 117.1 Applicability.

(a) This part prescribes flight and duty limitations and rest requirements for all flightcrew members and certificate holders conducting *passenger* operations under part 121 of this chapter.

(b) This part applies to all operations directed by part 121 certificate holders under part 91, other than subpart K, of this chapter if any segment is conducted as a domestic ~~passenger~~, flag ~~passenger~~, or supplemental ~~passenger~~ operation.

(c) This part applies to all flightcrew members when participating in an operation under part 91, other than subpart K of this chapter, on behalf of the part 121 certificate holder if any flight segment is conducted as a domestic ~~passenger~~, flag ~~passenger~~, or supplemental ~~passenger~~ operation

(d) Notwithstanding paragraphs (a), (b) and (c) of this section, a certificate holder may conduct under part 117 its part 121 operations pursuant to 121.470, 121.480, or 121.500.

§ 117.3 Definitions.

In addition to the definitions in §§ 1.1 and 110.2 of this chapter, the following definitions apply to this part. In the event there is a conflict in definitions, the definitions in this part control.

Acclimated means a condition in which a flightcrew member has been in a **new** theater for 72 hours **and** has been given at least 36 consecutive hours free from duty.

Acclimated Local Time means the local time at the location where the pilot last had greater than 36 hours free from duty.

Augmented flightcrew means a flightcrew that has more than the minimum number of flightcrew members required by the airplane type certificate to operate the aircraft to allow a flightcrew member to be replaced by another qualified flightcrew member for in-flight rest.

Calendar day means a 24-hour period from 0000 through 2359 using Coordinated Universal Time or local time.

Certificate holder means a person who holds or is required to hold an air carrier certificate or operating certificate issued under part 119 of this chapter.

Crew pairing means the time a pilot is scheduled by the certificate holder to operate an aircraft or deadhead that is unbroken by a duty-free period at the pilot's home base.

Deadhead transportation means transportation of a flightcrew member as a passenger or non-operating flightcrew member, by any mode of transportation, as required by a certificate holder, excluding transportation to or from a suitable accommodation. All time spent in deadhead transportation is duty and is not rest. For purposes of determining the maximum flight duty period in Table B of this part, deadhead transportation is not considered a flight segment **if the flight duty period has less than 4 other flight segments and does not operate within the WOCL.**

Duty means any task that a crew member performs **on behalf of** the certificate holder, including but not limited to **reserve duty (other than long-call/assignable reserve)**, flight duty period, flight duty, pre- and post-flight duties, administrative work, training, deadhead transportation, aircraft positioning on the ground, aircraft loading, and aircraft servicing.

Fatigue means a physiological state of reduced mental or physical performance capability resulting from lack of sleep, increased physical activity, **long periods of mental strain, immobility, heavy mental workload, strong emotional pressure, or monotony** that can reduce a flightcrew member's alertness and ability to safely operate an aircraft or perform safety-related duties. **Acute fatigue is prevented by adequate rest and sleep, as well as by regular exercise and proper nutrition. Chronic fatigue results from inadequate recovery from acute fatigue and may impair performance, essential to flight safety, even after recovery from acute fatigue. Recovery from chronic fatigue requires a prolonged period of rest.**

Fatigue risk management system (FRMS) *means a management system for a certificate holder to use to mitigate the effects of fatigue in its particular operations. It is a data-driven process and a systematic method used to continuously monitor and manage safety risks associated with fatigue-related error.*

Fit for duty means physiologically and mentally prepared and capable of performing assigned duties in flight at the highest degree of safety.

Flight duty period (FDP) means a period that begins when a flightcrew member is required to report for duty with the intention of conducting a flight, a series of flights, **deadhead transportation**, or positioning or ferrying flights, and ends when the aircraft is parked after the last flight, there is no intention for further aircraft movement or **deadhead transportation** by the same flightcrew member, **and the flightcrew member is released into a rest period per § 117.25.**

Deadhead transportation for the sole purpose of simulator training, ground-based training, or administrative duty, shall not be considered part of a flight duty period, provided the flightcrew member receives rest, per § 117.25, prior to being assigned a flight duty period.

A flight duty period includes the duties performed by the flightcrew member on behalf of the certificate holder that occur before a flight segment or between flight segments without a required intervening rest period **per § 117.25.** Examples of tasks that are part of the flight duty period include deadhead transportation, training conducted in an aircraft or flight simulator, and airport/standby/**immediately assignable** reserve, if the above tasks occur before a flight segment or between flight segments without an intervening required rest period.

Airport/standby/immediately assignable reserve is always part of a flight duty period, without regard to the flightcrew member being assigned a flying or deadhead transportation segment.

Flight time means the quantity of time used to calculate FAR legalities. For part 121 operations, flight time shall accrue whenever a qualified pilot-in-command is on the aircraft and, for purpose and intention of flight, at least one of the following occurs: the aircraft has been moved from its original location, or fuel has been introduced to at least one of the engines. Flight time shall continue to accrue until both: the aircraft comes to a rest, for the purposes of granting access and/or egress of crew, passengers, cargo, or ground personnel; and fuel to the aircraft engines is terminated, whichever occurs last.

An auxiliary power unit shall not be construed to be an aircraft engine per this definition.

Home base/domicile means the location designated by a certificate holder where a flightcrew member normally begins and ends his or her **crew pairings**.

Lineholder means a flightcrew member who has an assigned flight duty period **not given as a result of a reserve assignment** and is not acting as a reserve flightcrew member.

Physiological night's rest means 10 hours of rest that encompasses the hours of 0100 and 0700 at the flightcrew member's home base, unless the individual has acclimated to a different theater. If the flightcrew member has acclimated to a different theater, the rest must encompass the hours of 0100 and 0700 at the acclimated location.

Report time means the time that the certificate holder requires a flightcrew member to report for an assignment.

Reserve availability period means a duty period during which a certificate holder requires a flightcrew member on short call reserve to be available to receive an assignment for a flight duty period.

Reserve duty means duty assigning a flightcrew member to be available to accept an assignment on relatively short notice for the purposes of covering flying that is not presently known to the certificate holder. Reserve duty falls into three categories:

Long-call/assignable reserve means a reserve period in which a flightcrew member receives a required rest period, from 12 to 18 hours, following notification by the certificate holder to report for duty.

Short-call/reasonably assignable reserve means a period of time in which a crewmember does not receive a required rest period following notification by the certificate holder to report for a flight duty period. This type of reserve would normally not preclude the pilot from remaining at the place of his or her choosing within the customary and reasonable local area for pilot residences.

Airport/standby/immediately assignable reserve means a defined duty period during which a crewmember is required by a certificate holder to be at, or in close proximity to, an airport for a possible assignment. This proximity would normally preclude the pilot from remaining at the place of his or her choosing within the customary and reasonable local area for pilot residences.

Reserve flightcrew member means a flightcrew member who a certificate holder requires to be available to receive an assignment for duty.

Rest facility means a bunk or seat accommodation installed in an aircraft that provides a flightcrew member with a sleep opportunity.

(1) Class 1 rest facility means a bunk or other surface that allows for a flat sleeping position, suitably padded and reasonably comfortable and suitable for sleeping, and is located separate from both the flight deck and passenger cabin in an area that is temperature-controlled, allows the flightcrew member to control light, and provides isolation from noise and disturbance.

(2) Class 2 rest facility means a seat in an aircraft cabin that allows for a flat or near flat sleeping position; is separated from passengers by a minimum of a curtain to provide darkness and some sound mitigation; suitably padded and reasonably comfortable and suitable for sleeping; and is reasonably free from disturbance by passengers or flightcrew members.

(3) Class 3 rest facility means a seat in an aircraft cabin or flight deck that reclines at least 40 degrees and provides leg and foot support. Seating in coach or economy class shall not be considered a rest facility under any circumstances.

Rest period means a continuous period determined prospectively during which the flightcrew member is free from all restraint by the certificate holder, including freedom from present responsibility for work should the occasion arise.

Scheduled means to appoint, assign, or designate for a fixed time.

Split duty means a flight duty period that has a scheduled break in duty that is less than a required rest period.

Suitable accommodation means [single-occupancy hotel room or equivalent with a bed, sound mitigation, and light and temperature controls that is reasonably free from disturbances](#). Suitable accommodation only applies to ground facilities and does not apply to aircraft onboard rest facilities.

Theater means a geographical area where local time [of the flightcrew member's last acclimation and that of the local time of his or her present location differ by no more than three time zones, or the departure point of the flightcrew member's last acclimation and the current location differ by no more than 60 degrees of longitude, whichever is more restrictive](#).

[For changes of time zone that include crossing of the International Date Line, only relative change, corrected for day, shall be considered for purposes of determining theater, under this definition.](#)

Unforeseen operational circumstance means an unplanned event of insufficient duration to allow for adjustments to schedules, including unforecast weather, equipment malfunction, or air traffic delay that is not reasonably expected.

Window of circadian low (WOCL) means a period of maximum sleepiness that occurs between 0200 and 0559 during a physiological night.

§ 117.5 Fitness for duty.

- (a) Each flightcrew member must report for any flight duty period rested and prepared to perform his or her assigned duties.
- (b) No certificate holder may assign and no flightcrew member may accept assignment to a flight duty period if the flightcrew member has reported for a flight duty period too fatigued to safely perform his or her assigned duties.
- (c) No certificate holder may permit a flightcrew member to continue a flight duty period if the flightcrew member has reported him or herself too fatigued to continue the assigned flight duty period.

~~(d) As part of the dispatch or flight release, as applicable, each flightcrew member must affirmatively state he or she is fit for duty prior to commencing flight.~~

(d) No certificate holder may bring about disciplinary action or harassment against any flightcrew member declining an assignment due to self-assessed fatigue. Any flightcrew member who is discharged, threatened, harassed, disciplined, or suffers any other manner of adverse discrimination in the terms and conditions of employment by the applicable certificate holder because of refusing or continuing a flight duty period, or reserve availability period, due to self-assessed fatigue, shall be entitled to no less than three times all relief necessary to make the employee whole, plus applicable recovery costs, including customary legal fees.

(1) The Administrator may fine certificate holders for violations of this paragraph \$27,500 per incident.

~~§ 117.7 Fatigue risk management system.~~

~~(a) No certificate holder may exceed any provision of this part unless approved by the FAA under a Fatigue Risk Management System that provides at least an equivalent level of safety against fatigue-related accidents or incidents as the other provisions of this part.~~

~~(b) The Fatigue Risk Management System must include:~~

~~(1) A fatigue risk management policy.~~

~~(2) An education and awareness training program.~~

~~(3) A fatigue reporting system.~~

~~(4) A system for monitoring flightcrew fatigue.~~

~~(5) An incident reporting process.~~

~~(6) A performance evaluation.~~

§ 117.9 Fatigue education and awareness training program.

(a) Each certificate holder must develop and implement an education and awareness training program, approved by the Administrator. This program must provide annual education and awareness training to all employees of the certificate holder responsible for administering the provisions of this rule including flightcrew members, dispatchers, individuals directly involved in

the scheduling of flightcrew members, individuals directly involved in operational control, and any employee providing direct management oversight of those areas.

(b) The fatigue education and awareness training program must be designed to increase awareness of:

- (1) Fatigue;
- (2) The effects of fatigue on pilots; and
- (3) Fatigue countermeasures

(c) (1) Each certificate holder must update its fatigue education and awareness training program every two years and submit the update to the Administrator for review and acceptance.

(2) Not later than 12 months after the date of submission of the fatigue education and awareness training program required by (c)(1) of this section, the Administrator shall review and accept or reject the update. If the Administrator rejects an update, the Administrator shall provide suggested modifications for resubmission of the update.

§ 117.11 Flight time limitation.

(a) No certificate holder may schedule and no flightcrew member may accept an assignment or continue an assigned flight duty period if the total flight time:

(1) Will exceed the limits specified in Table A of this part if the operation is conducted with the minimum required flightcrew.

(i) For flight duty periods falling under the limitations of Table B of this part and which operate within the WOCL, maximum flight time is limited to 8 hours.

(2) Will exceed 12 hours if the operation is conducted with a 3-pilot flightcrew.

(3) Will exceed 17 hours if the operation is conducted with a 4-pilot flightcrew.

(4) Will exceed the cumulative limits specified in § 117.23 of this part.

(b) If unforeseen operational circumstances arise after takeoff that are beyond the certificate holder's control, a flightcrew member may exceed the maximum flight time specified in paragraph (a) of this section and the

cumulative flight time limits in 117.23(b) to the extent necessary to safely land the aircraft at the next destination airport or alternate, as appropriate.

(c) Each certificate holder must report to the Administrator within 10 days any flight time that exceeded the maximum flight time limits permitted by this section. The report must contain the following:

- (1) A description of the extended flight time limitation and the circumstances surrounding the need for the extension; and
- (2) If the circumstances giving rise to the extension were within the certificate holder's control, the corrective action(s) that the certificate holder intends to take to minimize the need for future extensions.

(d) Each certificate holder must implement the corrective action(s) reported in paragraph (c)(2) of this section within 30 days from the date of the extended flight time limitation.

§ 117.13 Flight duty period: Unaugmented operations.

(a) Except as provided for in § 117.17, no certificate holder may assign and no flightcrew member may accept an assignment for an unaugmented flight operation if the scheduled flight duty period will exceed the limits in Table B of this part.

(b) If the flightcrew member is not acclimated:

- (1) The maximum flight duty period in Table B of this part is reduced by 30 minutes.
- (2) The applicable flight duty period is based on the local time at the theater in which the flightcrew member was last acclimated.

§ 117.15 Flight duty period: Split duty.

For an unaugmented operation only, if a flightcrew member is provided with a rest opportunity (an opportunity to sleep) in a suitable accommodation during his or her flight duty period, the time that the flightcrew member spends in the suitable accommodation is not part of that flightcrew member's flight duty period if all of the following conditions are met:

- (a) The rest opportunity is between the hours of 22:00 and 05:00 local time.

- (b) The time spent in the suitable accommodation is at least 4 hours, measured from the time that the flightcrew member reaches the suitable accommodation.
- (c) The rest opportunity is scheduled before the beginning of the flight duty period in which that rest opportunity is taken.
- (d) The rest opportunity that the flightcrew member is actually provided may not be less than the rest opportunity that was scheduled.
- (e) The rest opportunity is not provided until the first segment of the flight duty period has been completed.
- (f) The combined time of the flight duty period and the rest opportunity provided in this section does not exceed 14 hours.
- (g) This provision is not applicable to passenger transportation where seating configuration exceeds 19.

§ 117.17 Flight duty period: Augmented flightcrew.

- (a) For flight operations conducted with an acclimated augmented flightcrew, no certificate holder may assign and no flightcrew member may accept an assignment if the scheduled flight duty period will exceed the limits specified in Table C of this part.
- (b) If the flightcrew member is not acclimated:
 - (1) The maximum flight duty period in Table C of this part is reduced by 30 minutes.
 - (2) The applicable flight duty period is based on the local time at the flightcrew member's home base.
- (c) No certificate holder may assign and no flightcrew member may accept an assignment under this section unless during the flight duty period:
 - (1) Two consecutive hours in the second half of the flight duty period are available for in-flight rest for both flightcrew members occupying a control seat during landing.

(d) No certificate holder may assign and no flightcrew member may accept an assignment involving more than three flight segments under this section.

(e) At all times during flight, at least one flightcrew member qualified in accordance with § 121.543(b)(3)(i), § 121.433, § 121.434, and § 121.439 of this chapter must be at the flight controls.

(f) No certificate holder may assign and no flightcrew member may accept an assignment involving two consecutive flight duty periods with an intervening rest period greater than 18 hours and less than 33 hours unless,

- (1) at least one of the flight duty periods is less than 6 hours in duration or,
- (2) neither flight duty period operates within the window of circadian low by greater than 90 minutes for flight duty periods less than 8 hours or,
- (3) neither flight duty period originates within nor penetrates the window of circadian low for flight duty periods of 8 hours or greater or,
- (4) each flight duty period which operates within the window of circadian low is augmented with at least 3 pilots with a Class III, or better, rest facility available.

(g) Augmented flight crews shall be limited to the unaugmented flight time limits of Table A of this part and the flight duty time limits of Table B of this part if the flight duty period originates and terminates within the continental United States, Canada, Mexico, Bermuda, Bahamas, and the Caribbean islands.

§ 117.19 Flight duty period extensions.

(a) For augmented and unaugmented operations, if unforeseen operational circumstances arise prior to takeoff:

(1) The pilot in command and the certificate holder may extend the maximum flight duty period permitted in Tables B or C of this part up to 2 hours.

(i) For unaugmented operations, no extensions of the flight duty period are allowed if the flight duty period will contain more than 4 flight segments or operate within the WOCL.

(2) An extension in the flight duty period under paragraph (a)(1) of this section of more than 30 minutes may occur only once in a 168 hour period, as measured from the end of the previous extension.

(3) A flight duty period cannot be extended under paragraph (a)(1) of this

section if it causes a flightcrew member to exceed the cumulative flight duty period limits specified in 117.23(c).

(4) Each certificate holder must report to the Administrator within 10 days any flight duty period that exceeded the maximum flight duty period permitted in Tables B or C of this part by more than 30 minutes. The report must contain the following:

- (i) A description of the extended flight duty period and the circumstances surrounding the need for the extension; and
- (ii) If the circumstances giving rise to the extension were within the certificate holder's control, the corrective action(s) that the certificate holder intends to take to minimize the need for future extensions.

(5) Each certificate holder must implement the corrective action(s) reported in paragraph (a)(7) of this section within 30 days from the date of the extended flight duty period.

(b) For augmented and unaugmented operations, if unforeseen operational circumstances arise after takeoff:

(1) The pilot in command and the certificate holder may extend maximum flight duty periods specified in Tables B or C of this part to the extent necessary to safely land the aircraft at the next destination airport or alternate airport, as appropriate.

(2) An extension of the flight duty period under paragraph (b)(1) of this section of more than 30 minutes may occur only once [in a 168 hour period, as measured from the end of the previous extension.](#)

(3) An extension taken under paragraph (b) of this section may exceed the cumulative flight duty period limits specified in § 117.23(c).

(4) Each certificate holder must report to the Administrator within 10 days any flight duty period that exceeded the maximum flight duty period limits permitted by Tables B or C of this part. The report must contain a description of the circumstances surrounding the affected flight duty period.

[\(c\) Extension of a flight duty period beyond the limitations permitted by Tables B or C of this part, or the allowable extension permitted by § 117.19\(a\) and § 117.19\(b\), for the sole purpose of returning the flightcrew member to his or her home base/domicile is permissible under the following conditions:](#)

- [\(1\) the extension consists solely of deadhead transportation.](#)
- [\(2\) the deadhead transportation is the last event in the flight duty period and](#)

crew pairing.

(3) the extension is done at the request of the flightcrew member.

(4) the flightcrew member cannot be scheduled or assigned any duties with the certificate holder until after legal rest provided per section § 117.25, which does not begin until after the scheduled time the flightcrew member would have arrived had the flight duty period not been extended per this paragraph.

(5) such deadhead transportation is considered part of the cumulative limits in § 117.23(c).

(i) If the flightcrew member elects deadhead transportation to a destination not associated with his or her home base/domicile, such transportation is only considered part of the cumulative limits in § 117.23(c) for the scheduled time to return the flightcrew member to his or her home base/domicile, or to the actual destination, whichever is less.

(d) Reports to The Administrator per § 117.19(a)(4), and § 117.19(b)(4) and actions per § 117.19(a)(5), are not required for flight duty period extensions per § 117.19(c).

(e) No flightcrew member shall be compelled to accept an extended flight duty period if he or she believes he or she is too fatigued to complete per § 117.5(c).

(1) No certificate holder may bring about disciplinary action or harassment against any flightcrew member refusing to accept an extension of a flight duty period provided in § 117.19. Any flightcrew member who is discharged, threatened, harassed, disciplined, or suffers any other manner of adverse discrimination in the terms and conditions of employment by the applicable certificate holder because of refusing to accept an extension of a flight duty period provided in § 117.19 shall be entitled to no less than three times all relief necessary to make the employee whole, plus applicable recovery costs, including customary legal fees.

(2) Refusal to accept an extension of a flight duty period provided in § 117.19, or advocacy of such, shall not be construed by any arbitrator, mediator, or court to be an illegal job action under, or a violation of the “status quo” under the Railway Labor Act,

(3) The Administrator may fine certificate holders for violations of § 117.19(e) \$27,500 per incident.

§ 117.21 Reserve status.

(a) Unless specifically designated as airport standby/**immediately assignable reserve** or short call/**reasonably assignable reserve** by the certificate holder, all reserve is considered long-call/**assignable reserve**.

(b) Any reserve that meets the definition of airport standby/**immediately assignable reserve** must be designated as airport standby/**immediately assignable reserve**. For airport standby/**immediately assignable reserve**, all time spent in a reserve status is part of the flightcrew member's flight duty period. **This flight duty period shall only be terminated when the flightcrew member is released into a rest period per § 117.25(e),**

(c) For short call/**reasonably assignable reserve**,

(1) The reserve availability period may not exceed 14 hours.

(2) For a flightcrew member who has completed a reserve availability period, no certificate holder may schedule and no flightcrew member may accept an assignment of a reserve availability period unless the flightcrew member receives the required rest in § 117.25(e).

(3) For an unaugmented operation, the total number of hours a flightcrew member may spend in a flight duty period and a reserve availability period may not exceed the lesser of the maximum applicable flight duty period in Table B of this part plus 4 hours, or 16 hours, as measured from the beginning of the reserve availability period.

(4) For an augmented operation, the total number of hours a flightcrew member may spend in a flight duty period and a reserve availability period may not exceed the flight duty period in Table C of this part plus 4 hours, as measured from the beginning of the reserve availability period.

(5) **No certificate holder may assign and no flightcrew member may accept any reserve availability period beginning prior to 20 hours subsequent to the start of the previous reserve availability period.**

(6) **All time within the reserve availability period is duty.**

(d) For long-call/**assignable reserve**, if a certificate holder contacts a flightcrew member to assign him or her to a flight duty period, **or a reserve availability period, ~~that will begin before and operate into the flightcrew member's window of circadian low,~~** the flightcrew member must receive an

18 hour notice of report time, or beginning of the reserve availability period, from the certificate holder.

(1) The period of time that the flightcrew member is in a long-call/assignable reserve status does not count as duty.

(2) The flightcrew member may waive any part of the 18 hour rest period provided in § 117.21(d) to no less than 12 hours.

(i) No certificate holder may bring about disciplinary action or harassment against any flightcrew member refusing to waive any part of the rest period provided in § 117.21(d). Any flightcrew member who is discharged, threatened, harassed, disciplined, or suffers any other manner of adverse discrimination in the terms and conditions of employment by the applicable certificate holder because of refusing to waive any part of the long-call/assignable reserve rest period provided in § 117.21(d) shall be entitled to no less than three times all relief necessary to make the employee whole, plus applicable recovery costs, including customary legal fees.

(ii) Refusal to waive rest provided in § 117.21(d), or advocacy of such, shall not be construed by any arbitrator, mediator, or court to be an illegal job action under, or a violation of the “status quo” under the Railway Labor Act.

(iii) The Administrator may fine certificate holders for violations of § 117.21(d)(1)(i) \$27,500 per incident.

~~(e) A certificate holder may shift a reserve flightcrew member's reserve status from long-call to short-call only if the flightcrew member receives a rest period as provided in § 117.25(e).~~

§ 117.23 Cumulative limitations.

(a) The limitations of this section include all flying by flightcrew members on behalf of any certificate holder or 91K Program Manager during the applicable periods.

(b) No certificate holder may schedule and no flightcrew member may accept an assignment if the flightcrew member's total flight time will exceed the following:

(1) 34 hours in any 7 consecutive calendar day period for unaugmented operations or,

- (2) 42 hours in any 7 consecutive calendar day period for augmented operations or,
- (3) 100 hours in any 28 consecutive calendar day period or,
- (4) 1,000 hours in any 365 consecutive calendar day period.

(c) No certificate holder may schedule and no flightcrew member may accept an assignment if the flightcrew member's total Flight Duty Period will exceed:

- (1) 60 flight duty period hours in any 168 consecutive hours and
- (2) 190 flight duty period hours in any 672 consecutive hours.

§ 117.25 Rest period.

(a) No certificate holder may assign and no flightcrew member may accept assignment to any reserve or duty with the certificate holder during any required rest period.

(b) Before beginning any reserve or flight duty period, a flightcrew member must be given at least 30 consecutive hours free from all duty in any 168 consecutive hour period.

(c) If a flightcrew member operating in a new theater has received 36 consecutive hours of rest, that flightcrew member is acclimated and the rest period meets the requirements of paragraph (b) of this section.

(d) If a flightcrew member travels more than 60° longitude during a flight duty period or a series of flight duty periods that require him or her to be away from home base for more than 168 consecutive hours, the flightcrew member must be given a minimum of 56 consecutive hours rest upon return to home base. This rest must encompass three physiological nights' rest based on local time.

(e) No certificate holder may schedule and no flightcrew member may accept an assignment for any reserve or flight duty period unless the flightcrew member is given a rest period of at least 10 consecutive hours immediately before beginning the reserve or flight duty period measured from the time the flightcrew member [arrives at the hotel or suitable accommodation](#).

The 10 hour rest period must provide the flightcrew member with a minimum

of 8 uninterrupted hours of sleep opportunity.

(1) A flightcrew member who operates to a new theater shall be given at least 13 consecutive hours of rest, beginning upon arrival at the hotel or suitable accommodation, before beginning a reserve availability period or flight duty period.

(2) A flightcrew member who completes a flight duty period that impinges upon the WOCL shall be given at least 13 consecutive hours of rest, beginning upon arrival at the hotel or suitable accommodation, before beginning a reserve availability period or flight duty period.

(f) If a flightcrew member determines that a rest period under paragraph (e) of this section will not provide eight uninterrupted hours of sleep opportunity, the flightcrew member must notify the certificate holder. The flightcrew member cannot report for the assigned flight duty period until he or she receives a rest period specified in paragraph (e) of this section.

(g) If a flightcrew member engaged in deadhead transportation exceeds the applicable flight duty period in Table B of this part, the flightcrew member must be given a rest period equal to the length of the deadhead transportation but not less than the required rest in paragraph (e) of this section before beginning a flight duty period.

§ 117.27 Consecutive nighttime operations.

A certificate holder may schedule and a flightcrew member may accept up to five consecutive flight duty periods that infringe on the window of circadian low if the certificate holder provides the flightcrew member with an opportunity to rest in a suitable accommodation during each of the consecutive nighttime flight duty periods. The rest opportunity must be at least 4 hours, measured from the time that the flightcrew member reaches the suitable accommodation, and must comply with the conditions specified in § 117.15(a), (c), (d), and (e). Otherwise, no certificate holder may schedule and no flightcrew member may accept more than three consecutive flight duty periods that infringe on the window of circadian low. For purposes of this section, any split duty rest that is provided in accordance with § 117.15 counts as part of a flight duty period.

§117.29 Emergency and government sponsored operations.

(a) This section applies to operations conducted pursuant to contracts with the U.S. Government and operations conducted pursuant to a deviation under § 119.57 of this chapter that cannot otherwise be conducted under this part because of circumstances that could prevent flightcrew members from being relieved by another crew or safely provided with the rest required under § 117.25 at the end of the applicable flight duty period.

(b) The pilot-in-command may determine that maximum applicable flight duty periods must be exceeded to the extent necessary to allow the flightcrew to fly to the closest destination where they can safely be relieved from duty by another flightcrew or can receive the requisite amount of rest prior to commencing their next flight duty period.

(c) A flight duty period may not be extended for an operation conducted pursuant to a contract with the U.S. Government if it causes a flightcrew member to exceed the cumulative flight time limits in § 117.23(b) and the cumulative flight duty period limits in § 117.23(c).

(d) The flightcrew shall be given a rest period immediately after reaching the destination described in paragraph (b) of this section equal to the length of the actual flight duty period or 24 hours, whichever is less.

(e) Each certificate holder must report within 10 days:

(1) any flight duty period that exceeded the maximum flight duty period permitted in Tables B or C of this part, as applicable, by more than 30 minutes; and

(2) any flight time that exceeded the maximum flight time limits permitted in Table A of this part and § 117.11, as applicable.

(f) The report must contain the following:

(1) a description of the extended flight duty period and flight time limitation, and the circumstances surrounding the need for the extension; and

(2) if the circumstances giving rise to the extension(s) were within the certificate holder's control, the corrective action(s) that the certificate holder intends to take to minimize the need for future extensions.

(g) Each certificate holder must implement the corrective action(s) reported pursuant to paragraph (e)(2) of this section within 30 days from the date of the extended flight duty period.

Table A to Part 117—Maximum Flight Time Limits

Time of Start (acclimated)	Maximum Flight Time (hours)		
	Min Crew	3 Pilots	4 Pilots
0000-0559	8	12	17
0600-1559	9	12	17
1600-2359	8	12	17

Table B to Part 117—Flight Duty Period: Un-augmented Operations

Time of Start (acclimated)	Maximum Flight Duty Period (hours) for Lineholders Based On Number of Flight Segments						
	1	2	3	4	5	6	7+
0000-0359	9	9	9	9	9	9	9
0400-0459	10	10	10	10	9	9	9
0500-0559	12	12	12	11	10	10	10
0600-0659	13	13	12	12	11.5	11	10.5
0700-1159	14	14	13	13	12.5	12	11.5
1200-1259	13	13	13	13	12.5	12	11.5
1300-1359	12	12	12	12	11.5	11	10.5
1400-1459	12	12	12	11	11	11	10.5
1500-1559	12	12	12	11	10	10	9
1600-1659	12	12	12	11	9	9	9
1700-1859	12	12	11	11	9	9	9
1900-2159	12	12	11	10	9	9	9
2200-2259	11	11	10	10	9	9	9
2300-2359	10	10	10	9	9	9	9

Table C to Part 117—Flight Duty Period: Augmented Operations

Time of Start (acclimated)	Maximum Flight Duty Period (hours) Based on Rest Facility and Number of Pilots					
	Class I Rest Facility		Class II Rest Facility		Class III Rest Facility	
	3 Pilots	4 Pilots	3 Pilots	4 Pilots	3 Pilots	4 Pilots
0000-0559	15	17	14	15.5	13	13.5
0600-0659	16	18.5	15	16.5	14	14.5
0700-1259	17	19	16.5	18	15	15.5
1300-1659	16	18.5	15	16.5	14	14.5
1700-2359	15	17	14	15.5	13	13.5

PART 119— CERTIFICATION: AIR CARRIERS AND COMMERCIAL OPERATORS

2. The authority citation for part 119 continues to read as follows:

Authority: 49 U.S.C. 106(g), 1153, 40101, 40102, 40103, 40113, 44105, 44106, 44111, 44701–44717, 44722, 44901, 44903, 44904, 44906, 44912, 44914, 44936, 44938, 46103, 46105.

3. Amend § 119.55 to revise paragraph (a) to read as follows:

(a) The Administrator may authorize a certificate holder that is authorized to conduct supplemental or on-demand operations to deviate from the applicable requirements of this part, part 117, part 121, or part 135 of this chapter in order to perform operations under a U.S. military contract.

* * * * *

121—OPERATING REQUIREMENTS: DOMESTIC, FLAG, AND SUPPLEMENTAL OPERATIONS

4. The Authority section for part 121 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 40119, 44101, 44701-44702, 44705, 44709-44711, 44713, 44716-44717, 44722, 46901, 44903-44904, 44912, 46105.

5. Amend § 121.467 to revise paragraph (c) introductory text to read as follows:

§ 121.467 Flight attendant duty period limitations and rest requirements: Domestic, flag, and supplemental operations.

* * * * *

(c) Notwithstanding paragraph(b) of this section, a certificate holder conducting domestic, flag, or supplemental operations may apply the flightcrew member flight time and duty limitations and requirements of part 117 of this chapter to flight attendants for all operations conducted under this part provided that—

(1) The flightcrew is subject to part 117;

(2) ***
* * * * *

Subpart Q

6. Amend § 121.470 and add § 121.473 to read as follows:

§ 121.470 Applicability.

This subpart prescribes flight time limitations and rest requirements for domestic all-cargo operations, except that:

(a) Certificate holders conducting operations with airplanes having a passenger seat configuration of 30 seats or fewer, excluding each crewmember seat, and a payload capacity of 7,500 pound or less, may comply with the applicable requirements of §§ 135.261 through 135.273 of this chapter.

(b) Certificate holders conducting scheduled operations entirely within the States of Alaska or Hawaii with airplanes having a passenger seat configuration of 30 seats or fewer, excluding each crewmember seat, and a payload capacity of 7,500 pound or less, may comply with the applicable requirements of subpart R of this part for those operations.

~~(c) A certificate holder may apply the flightcrew member flight time and duty limitations and requirements of part 117 of this chapter. A certificate holder may choose to apply part 117 to its—~~

~~(1) Cargo operations conducted under contract to a US government agency;~~

~~(2) All cargo operations not conducted under contract to a US Government agency;~~

~~(3) A certificate holder may elect to treat operations in paragraphs (1) and (2) differently but, once having decided to include operations under paragraph (1) or (2) under part 117, may not segregate those operations between this subpart and part 117.~~

~~***~~

~~§ 121.473 Fatigue risk management system.~~

~~(a) No certificate holder may exceed any provision of this subpart unless approved by the FAA under a Fatigue Risk Management System.~~

~~(b) The Fatigue Risk Management System must include:~~

~~(1) A fatigue risk management policy.~~

~~(2) An education and awareness training program.~~

~~(3) A fatigue reporting system.~~

~~(4) A system for monitoring flightcrew fatigue.~~

~~(5) An incident reporting process.~~

~~(6) A performance evaluation.~~

Subpart R

7. Amend § 121.480 and add § 121.495 to read as follows:

§ 121.480 Applicability.

This subpart prescribes flight time limitations and rest requirements for flag all cargo operations, except that certificate holders conducting operations with airplanes having a passenger seat configuration of 30 seats or fewer, excluding each crewmember seat, and a payload capacity of 7,500 pound or less, may comply with the applicable requirements of §§ 135.261 through 135.273 of this chapter.

~~(b) A certificate holder may apply the flightcrew member flight time and duty limitations and requirements of part 117 of this chapter. A certificate holder may choose to apply part 117 to its—~~

~~(1) All cargo operations conducted under contract to a US government agency;~~

~~(2) All cargo operations not conducted under contract to a US Government agency;~~

~~(3) A certificate holder may elect to treat operations in paragraphs (1) and (2) differently but, once having decided to include operations under paragraph (1) or (2) under part 117, may not segregate those operations between this subpart and part 117.~~

~~***~~

~~§ 121.495 Fatigue risk management system.~~

~~(a) No certificate holder may exceed any provision of this subpart unless approved by the FAA under a Fatigue Risk Management System.~~

~~(b) The Fatigue Risk Management System must include:~~

~~(1) A fatigue risk management policy.~~

~~(2) An education and awareness training program.~~

~~(3) A fatigue reporting system.~~

~~(4) A system for monitoring flightcrew fatigue.~~

~~(5) An incident reporting process.~~

~~(6) A performance evaluation.~~

Subpart S

8. Amend § 121.500, § 121.583(a), and add § 121.527 to read as follows:

§ 121.500 Applicability.

This subpart prescribes flight time limitations and rest requirements for supplemental all-cargo operations, except that certificate holders conducting operations with airplanes having a passenger seat configuration of 30 seats or fewer, excluding each crewmember seat, and a payload capacity of 7,500 pound or less, may comply with the applicable requirements of §§ 135.261 through 135.273 of this chapter.

~~(b) A certificate holder may apply the flightcrew member flight time and duty limitations and requirements of part 117 of this chapter. A certificate holder may choose to apply part 117 to its—~~

~~(1) All cargo operations conducted under contract to a US government agency;~~

~~(2) All cargo operations not conducted under contract to a US Government agency;~~

~~(3) A certificate holder may elect to treat operations in paragraphs (1) and (2) differently but, once having decided to include operations under paragraph (1) or (2) under part 117, may not segregate those operations between this subpart and part 117.~~

~~***~~

§ 121.583 - Carriage of persons without compliance with the passenger-carrying requirements of this part and part 117

(a) When authorized by the certificate holder, the following persons, but no others, may be carried aboard an airplane without complying with the passenger-carrying airplane requirements in §§ 121.309(f), 121.310, 121.391, 121.571, and 121.587; the passenger carrying operation requirements in part 117 and §§ 121.157(c) and 121.291; and the requirements pertaining to passengers in §§ 121.285, 121.313(f), 121.317, 121.547, and 121.573: * * *

~~§ 121.527 Fatigue risk management system.~~

~~(a) No certificate holder may exceed any provision of this subpart unless approved by the FAA under a Fatigue Risk Management System.~~

~~(b) The Fatigue Risk Management System must include:~~

- ~~(1) A fatigue risk management policy.~~
- ~~(2) An education and awareness training program.~~
- ~~(3) A fatigue reporting system.~~
- ~~(4) A system for monitoring flightcrew fatigue.~~
- ~~(5) An incident reporting process.~~
- ~~(6) A performance evaluation.~~