



**DEFENSE MINISTRY
AERONAUTICS COMMAND
GROUP OF SPECIAL TRANSPORT**

TERM OF REFERENCE

Base Legal: Prepared based on the premises contained in Art. 1st, of Annex III of Ordinance GM-MD 5.175, of December 15, 2021.

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1. PREAMBLE

1.1. The giftReference term aims to present the set of necessary and sufficient elements, with an adequate level of precision, to characterize the specifications for hiring Flight Simulator Training for the aircraftEMB-190/195, for a period of 12 months, with the possibility of extensions up to a limit of 60 months.

1.2. It isReference term was prepared based on preliminary indications, which ensure technical feasibility, evaluate its costs, define its deadlines and execution methods, as well as guide and discipline the relationship between the future CONTRACTOR and the CONTRACTING PARTY.

2. DEFINITIONS

2.1. With the aim of facilitating the understanding of terminologies and simplifying the text, the abbreviations that follow as well as the expressions were adopted, followed by their subsequent definitions:

2.1.1. COMAER – Air Force Command;

2.1.2. COMREC – Commission for Receiving Products and Services;

2.1.3. CONTRACTOR – individual or legal entity hired to perform the services;

2.1.4. CONTRACTOR – Special Transport Group;

2.1.5. ICA – Air Force Command Instruction;

2.1.6. INSPECTION - Individual or commission representing the CONTRACTING PARTY before the CONTRACTOR, systematically appointed to monitor and supervise the execution of the contractual instrument and the complementary requests issued by the Federal Government, in all its aspects;

2.1.7. PAG – Administrative Management Process;

2.1.8. PAAI - Formal internal administrative procedure composed of the registration of all acts and the verification of administrative facts, necessary for the correct clarification and judgment of the Competent Authority, allowing it to instruct the due legal process, which culminates in the application or not of the administrative sanctions provided for in Law (ICA 12-23/2019);



2.1.9. RECEIPT TERM – Document issued by COMREC attesting and accepting the services performed.

3. OBJECT

3.1. Hiring a rental service 280 hours of “DRY” training on aircraft flight simulator equipment VC-2 (EMB 190/195), in order to meet the needs of COMAER in accordance with the Technical Data Sheet, Anexos A1, according to the conditions, quantities and requirements established in this instrument, and the table below:

ITEM	ODGSA	QTD OF HOURS	AIRCRAFT	CATEGORY	TYPE	REFERENCE UNIT VALUE (USD)	TOTAL REFERENCE VALUE (USD)
1	GABAERS	280 hours	VC-2 (EMB-190/195)	D	DRY	714,98	200,194.03

3.2. It is worth mentioning that the “DRY” type training, presented in the Technical Data Sheet, means that the CONTRACTED company should only rent the hours in the simulator, since the instructors will be the pilots of the Brazilian Air Force staff, after completing the operation course of the simulator, provided by the CONTRACTOR.

3.3. In view of the complexity of the avionics and the emergencies associated with the aircraft, the simulator for training pilots must be certified as a Full Flight Simulator (FFS), minimum acceptable level "D". The qualification of Flight Simulator Training Devices (FSTD - Flight Simulator Training Devices) aims to verify their performance and realism characteristics, as well as classify them in the various existing categories. Qualification is an activity based on technical standards issued by civil aviation regulatory agencies, which establish objective and subjective parameters of quality and realism. In the case of COMAER, the FSTD are used for training provided for in the Operational Instruction and Maintenance Programs of the subordinate air units.

3.4. The simulator must be approved by ANAC (Agência Nacional de Aviação Civil), by the FAA (Federal Aviation Administration) or by EASA (European Union Aviation Safety Agency), aviation regulatory agencies in Brazil, the United States and Europe, which have a qualification system for Flight Simulator Training Devices (FSTD – Flight Simulator Training Devices), which aims to verify their performance and realism characteristics, as well as classify them in the various existing categories. The FSTD qualification is an activity based on technical standards issued by civil aviation regulatory agencies, which establish objective and subjective parameters of quality and realism.



- 3.5.** To ensure approval by ANAC, the BIDDER may check its qualification through the website: <https://www.anac.gov.br/assuntos/setor-regulado/empresas/simuladores-de-voo-fstd/arquivos/Simulador.xls>.
- 3.6.** To ensure homologation by the FAA, the BIDDER can verify its qualification through the FAA website: https://www.faa.gov/about/initiatives/nsp/data_lists/.
- 3.7.** To ensure approval by EASA, the BIDDER may check its qualification through the EASA website: <https://lisstdis.easa.europa.eu> (FSTD qualified by EASA and FSTDs qualified by the National Aviation Authority of respective EU Member State – incl. EFTA States).
- 3.8.** The FSTD may be approved as a means of training in an Air Operator Operational Training Program (RBAC 121 or RBAC 135), Civil Aviation Training Center (RBAC 142) or in a Civil Aviation School Instruction Program (RBHA 141). In the case of COMAER, the FSTD are used for training provided for in the Operational Elevation Programs of the subordinate air units.
- 3.9.** It is registered that the execution of the services of this Reference term must comply with the laws and regulations determined by the US government, the district and state in which the buildings are located.

4. JUSTIFICATION

The Group of Special Transport what Our mission is to ensure the air transport of the President of the Republic, the Vice-President, the Ministers of State and high national and foreign authorities, as well as carry out Mercy Missions, with equipment such as the COMAER Air Intensive Care Unit and missions in support to the other COMAER organizations, when determined by the Air Force Commander. The VC-2 (EMB 190-195) is one of the aircraft used to fulfill this regulatory mission.

- 4.1.** The Air Force Command makes use of specific internal regulations, the Instruction of the Air Force Command (ICA) 51-1/2020, which deals with the Operational Instruction and Maintenance Program of the Special Transport Group, provides as a fundamental requirement, flight simulator training for its pilots.
- 4.2.** The Air Force Command also uses specific internal regulations, the Instruction of the Air Force Command (ICA) 12-16/2007, which deals with management and training in flight simulators in Brazil and abroad. The said instruction provides that the needs of each Military Organization are forwarded to the respective General Commands, Departments and GABAER, with the purpose of being condensed and analyzed according to the real needs of the respective Military Organization.



- 4.3.** CABW is an Organization of the Air Force Command responsible for the acquisition and contracting, outside the country, of war and military goods and services intended for the final use of the Military Organizations of COMAER that are not manufactured or repaired by companies based in the national territory. The contracting of the intended service is necessary, since in Brazil there are not enough technical requirements to meet the equivalent application standards and specifications suitable for the purpose for which they are intended, according to the § 2 of Art. 17, of Annex III of Ordinance GM-MD 5.175, of December 15, 2021, in which the acquisition or contracting abroad will also be admitted if the goods or services in the country have a production capacity lower than the quantity to be acquired or contracted or do not meet the necessary delivery deadlines.
- 4.4.** Flight simulators are devices used to qualify technical crew members, where only in this equipment is it possible to train critical emergency situations in flight and on the ground with great realism, without risk to the lives of crew members and the integrity of the aircraft.
- 4.5.** In addition, the use of flight simulators saves fuel and aircraft cell hours, directly influencing the cost of training and the environmental impact generated by burning fuel.
- 4.6.** With said training, Air Force personnel from the Air Force Officers will be prepared to face adverse situations, aiming at the safety of operations on board aircraft.
- 4.7.** Without prejudice to the provisions of clause 3 above, in relation to the total hours to be contracted, the training and operational maintenance program for pilots of the Brazilian Air Force provides annually the provision of contracting service for 280 (two hundred and eighty) hours of simulator training, for the VC-2 aircraft (EMB 190/195), in order to supply the training of 03 (three) pilots, emergency training for 21 (twenty-one) pilots and training for operational elevation of 04 (four) pilots of the Special Transport Group (GTE).
- 4.8.** In addition, it should be noted that the contract on the screen aims to contemplate the rotation of pilots who are assigned to GABAER, considering the natural movement of personnel that occurs annually in the Air Force Command (COMAER).
- 4.9.** The continuous service is customary for the Air Force Command, since it is necessary that the activity to be provided is by contracting third parties on a permanent basis, given that the Brazilian Air Force does not have the aircraft's flight simulator VC-2 (EMB-190/195) in its collection.
- 4.10.** Therefore, the contracting of the intended services is necessary to reduce expenses in the initial training of pilots and to provide continuity to their training in the aircraft VC-2 (EMB-190) of the Brazilian Air Force. Therefore, it is extremely important to hire pilots to instruct them, as well as to maintain the replenishment of pilots in order to fulfill the mission of transporting the Honorable President of the Federative Republic of Brazil.



5. ESTIMATED BUDGET

5.1. The estimated value, with the lowest cost, for carrying out the simulator service for the aircraft VC-2 (EMB190/195) is USD 200,194.03 (two hundred thousand one hundred and ninety four US dollars and three cents) for the training of 03 (three) pilots, emergency training for 21 (twenty-one) pilots and training for operational elevation of 04 (four) pilots of the Special Transport Group (GTE), for 12 months of contractual execution of a DRY simulator.

5.2. The number of estimated hours included in this Reference term does not imply any obligation of the CONTRACTING PARTY.

6. BUDGET ALLOCATION

6.1. The expenses arising from the hiring must be paid with the resources of Type of Expense 33.90.39, received by CABW from the Air Force Command Action Plan based on the General Budget for the fiscal year.

7. EXECUTION REGIME

7.1. The constant service of this Reference term must be contracted for the lowest price, and execution regime of “Contract for Unit Price”.

8. CLASSIFICATION OF SERVICES

8.1. The service to be contracted fits as a continuous service, as defined in Art. 15 of IN-SLTI No. 05/2017 and item 1.1 of this Reference term.

8.2. It should be noted that continuous services are those whose interruption could jeopardize the fulfillment of the institutional mission, and, therefore, their continuous execution is necessary to ensure the functioning of the body's core activity. Flight simulator training is essential for Brazilian Air Force pilots to be able to face adverse flight situations in order to fulfill the Special Transport mission.

8.3. The services to be contracted fall within the assumptions of Decree No. 9.507, of 2018, constituting incidental, instrumental or complementary material activities to the area of legal competence of the bidding body, not inherent to the functional categories covered by its respective plan of positions.

8.4. The provision of services does not create an employment relationship between the Contractor's employees and the Administration, prohibiting any relationship between them that characterizes personality and direct subordination.



9. ENVIRONMENTAL SUSTAINABILITY CRITERIA

9.1. Any installation, equipment or process, located in a fixed location, that releases or emits matter into the atmosphere, by punctual or fugitive emission, used in the performance of the contract, must respect the maximum limits of emission of pollutants allowed in CONAMA Resolution No. 382, of 26/12/2006, and related legislation, according to the pollutant and the type of source, if located in Brazil, or related legislation, if located abroad.

9.2. In the contractual execution, as the case may be, the emission of noise cannot exceed the levels considered acceptable by Standard NBR-10.151 - Noise Assessment in Inhabited Areas aiming at the comfort of the community, of the Brazilian Association of Technical Standards - ABNT, or those established in NBR-10.152 - Noise Levels for acoustic comfort, from the Brazilian Association of Technical Standards - ABNT, pursuant to CONAMA Resolution No. 01, of 03/08/1990, or related legislation, if located abroad.

10. SPECIFICATION OF SERVICES

10.1. The services will be carried out at the CONTRACTOR's premises, according to COMAER's needs.

10.2. The days to be made available will be business days, Saturdays and Sundays, according to the timetable made available by the CONTRACTOR.

10.3. The CONTRACTOR shall perform the service using the materials and equipment necessary for the perfect execution of the services to be provided, according to nexus A1 (Tokentechnique).

10.4. For the purposes of “DRY” type training, the instructors will be the Air Force pilots themselves.

10.5. The simulation equipment should offer scenarios of the Brazilian territory, with emphasis on the following airports: SBBR, SBSP, SBGR, SBGL and SBRJ.

10.6. For training purposes, pilots can perform the following maneuvers on the simulation equipment:

10.6.1. Flight preparation procedures, including pre-flight inspections flight, engine operation and aircraft systems;

10.6.2. Rolling and operations on the surface of the airport;

10.6.3. Normal takeoffs and landings, with crosswinds and/or with some type of failure in the various equipment and systems of the aircraft (engine failure in flight, engine fire



in flight, tripping of trim tabs, electrical failures, failures in the pressurization system, failures in the hydraulic system, etc.);

10.6.4. Maximum performance takeoffs (short runway and overcoming obstacles);

10.6.5. Flight with or without autopilot;

10.6.6. Air traffic circuits, including entry and exit procedures, proper operation of the MFD's 'TERRAIN' mode for information on mountainous regions;

10.6.7. Straight and level flight;

10.6.8. Airplane control and maneuvers through external visual references;

10.6.9. Climbs and rising curves;

10.6.10. Descents with and without turns using high and low resistance settings;

10.6.11. Flights with different speeds, from cruising to minimum controlled speed;

10.6.12. Flight at low critical speeds, recognition and recovery from pre-stall, full stall and spin;

10.6.13. Flight with asymmetric power;

10.6.14. Emergency procedures and malfunctions of aircraft equipment and systems;

10.6.15. Air traffic circuits, including entry and exit procedures, ways to avoid collisions and aircraft wake turbulence;

10.6.16. Instrument approach training (NDB, VOR, RNAV and ILS);

10.6.17. Approaches to the landing area with engine power at idle, with partial power and single engine;

10.6.18. I glide for landing;

10.6.19. Missed approaches from final approach to touchdown in various flight configurations, including turns;

10.6.20. Ability to train instrument procedures under CAT II and CAT III conditions;

10.6.21. Forced landing procedures, starting from: a takeoff, during the initial climb; since the cruise flight; and from the descent and landing transit;

10.6.22. Stall entries from various attitudes and power combinations with recovery starting at the first indication of stall and recovery from a full stall;

10.6.23. Recovery of the aircraft from a stall or from entering an abnormal attitude;

10.6.24. Recognition and management of threats and errors;

10.6.25. Operations at aerodromes and in traffic circuits; collision avoidance precautions and procedures;

10.6.26. Flight at low critical speeds, pre-stall recognition and recovery, full stall;

10.6.27. Short runway landings;



- 10.6.28. Basic flight maneuvers and abnormal attitude recovery by reference to basic flight instruments only;
- 10.6.29. Flight navigation through visual references, estimated navigation and with the aid of radio navigation;
- 10.6.30. Emergency operations, including simulated aircraft equipment failures;
- 10.6.31. Operations with origin, destination or transit through controlled aerodromes, complying with the procedures of the air traffic control services and the procedures and phraseology of radio communication; It is
- 10.6.32. Procedures and phraseology for communications.

10.7. The continuous service is customary for the Air Force Command, since it is necessary that the activity to be provided is by contracting third parties on a permanent basis, given that the Brazilian Air Force does not have the flight simulator for the VC-2 aircraft (EMB 190/195) in its collection.

10.8. The initial duration of the contract will be 12 months, extendable up to a limit of 60 months, pursuant to Art. 115 of Annex III, of Ordinance GM-MD 5.175, of December 15, 2021.

11. SERVICE EXECUTION EVALUATION METHODOLOGY

11.1. The services must be performed based on the minimum parameters established below:

- 11.1.1. Full functionality of 3D screens;
- 11.1.2. Complete functioning of the instructor's panel your commands;
- 11.1.3. Operation of MOTION to execute the instruction in FFS (Full Flight Simulator);
- 11.1.4. Operation of all aircraft instruments;
- 11.1.5. Updated database of MCDO with the procedures in force at the airport Brazilians and international;
- 11.1.6. Autopilot fully functioning.
- 11.1.7. Operation of aircraft systems in accordance with the *Quick Reference Handbook* (QRH); e
- 11.1.8. Operation of all aircraft displays.

11.2. The CONTRACTOR, in case of malfunction of the equipment during the execution of the service, must make efforts to solve the imperfections in a maximum of 24 hours, and must



relocate the schedules foreseen for the Brazilian Air Force, in coordination with the most senior Officer of the crew, until the specific date of return of the crew members in training, in order to avoid greater damages to the instruction.

11.3. In case of any irregularity (“crash”) in the simulator that makes it impossible to finish the training of the scheduled hours, the count will be interrupted and only the hours used will be received.

11.4. In order to receive it, the following must be evaluated:

11.4.1. Compliance with scheduled times: if there were delays in the beginning of the training by the CONTRACTOR that could harm the Administration;

11.4.2. Recurring simulation system issues that may interfere with simulation training;

11.4.3. The suitability of the equipment to the constant demands in this instrument.

11.5. The CONTRACTOR must provide the simulator's location and equipment in good conditions of cleanliness and maintenance.

11.6. Training and services will be provided upon demand by the Special Transport Group and confirmation of slot availability by CONTRACTOR.

12. EXECUTION OF SERVICES AND THEIR RECEIPT

12.1. The execution of the services will start from the signature of the contract, as follows:

12.2. The term of validity of the Agreement shall be 12 (twelve) months from the date of its signature. The validity may be extended, by agreement between the parties, for an additional period of 12 months, if in the CONTRACTING PARTY's interest, up to a maximum limit of 60 months.

12.3. The term may exceed the financial year, provided that the expenses related to the contract are fully committed by December 31, for the purposes of registration in outstanding amounts to be paid, according to AGU Normative Guideline No. 39, of 12/13/2011.

12.4. The services may be rejected, in whole or in part, when they do not comply with the specifications contained in this Reference term and in the proposal, and must be corrected/remade/replaced within the period set by the contract inspector, at the CONTRACTOR's expense, without prejudice to the application of penalties.

12.5. The services that are subject to the contract must be received by COMREC in accordance with the specifications set out in the Reference term.



12.6. It is the responsibility of the RECEIPT COMMITTEE(COMREC):

12.6.1. Make sure that the CONTRACTOR will follow the description of all the services that are the subject of the Reference term;

12.6.2. Receive or reject the services in accordance with the specifications described in the Reference term within 15 (fifteen) calendar days.

12.6.3. Once approved, the invoices will be sent to the Contracts Division of CABW, accompanied by the Acknowledgment of Receipt within 5 (five) days. If there are discrepancies, the invoice must be returned to the CONTRACTOR, so that the necessary corrections can be made, with a letter explaining the reasons for the return; It is

12.6.4. During the execution of the contract, all proposals, questions, discrepancies and difficulties encountered during the execution of the contractor requiring an assessment must be submitted to the oversight, for consideration by the GTE Commander.

13. OBLIGATIONS

13.1. CONTRACTING PARTY'S OBLIGATIONS:

13.1.1. Provide all the conditions that enable the CONTRACTOR to carry out the services, in accordance with the provisions set forth in contract;

13.1.2. Require the fulfillment of all obligations assumed by the CONTRACTOR, in accordance with the provisions contained in the Reference term, no contract and in the terms and conditions of your proposal;

13.1.3. Supervise services by Administration agents officially designated for this purpose, who will record any failures found, demonstrating the day, month and year, as well as the names of people who may be involved, sharing such information with the relevant authorities for any action applicable;

13.1.4. Notify the CONTRACTOR, in writing, of the occurrence of any irregularities during the execution of the services and establish a deadline for their correction;

13.1.5. Pay the CONTRACTOR the amount due for the provision of services, as established in the CONTRACT by receiving and accepting an invoice; It is

13.1.6. Ensure that, throughout the term of the CONTRACT, all eligibility conditions and qualifications required in the bidding process will be maintained, in accordance with the obligations assumed by the CONTRACTOR.



13.2. EMPLOYEE'S OBLIGATIONS:

13.2.1. Perform the services in accordance with the specifications provided in the Reference term and in its proposal, with the necessary resources for full compliance with the provisions of the CONTRACT in question;

13.2.2. Repair, correct, remove or replace, at its expense, in whole or in part, any activities carried out that are the result of errors, failures or defects, at the discretion of the Management, presenting a new methodology for analysis;

13.2.3. Ensure that its employees are properly trained, licensed and/or certified to operate the necessary systems or equipment for which licensed and/or certified persons are required by federal, state or local law; codes or ordinances;

13.2.4. Be responsible for making management and operational decisions to meet the quality levels required in the contract;

13.2.5. The CONTRACTOR must be responsible for maintaining satisfactory levels of competence, conduct, appearance and integrity of its employees and must be responsible for taking administrative actions related to its employees, if necessary;

13.2.6. Bear civil liability for any and all material damages to the Brazilian Nation and for damages caused by action or omission by contracted employees, workers, agents or representatives of the CONTRACTOR;

13.2.7. Use in accordance with the object of this Reference term, employees qualified in compliance with current rules and regulations;

13.2.8. Prohibit, during the performance of services, the use of employees related to public offices, positions of trust or part of the Commission in CABW;

13.2.9. Provide all personnel, work, equipment, materials, tools, supervision, management, training/certifications and services, except as expressly appointed by the CONTRACTING PARTY, and perform all necessary actions related or caused and perform and provide the efforts described in the contract;

13.2.10. Be responsible for all labor, social, social security, tax and other obligations provided for in the specific legislation, the default of which does not transfer responsibility to the CONTRACTING PARTY;

13.2.11. Do not transfer to third parties any responsibility connected with the obligations assumed, even in the case of subcontracting, if approved by the CONTRACTING PARTY;



13.2.12. Be responsible for any costs resulting from any errors made in calculating the number of items in your proposal, including variable costs associated with future and uncertain events;

13.2.13. Provide all clarifications requested by the CONTRACTING PARTY, immediately investigating complaints;

13.2.14. Total or partial non-performance of the responsibilities assumed by the CONTRACTOR may result in the application of administrative sanctions, established in the CONTRACT, including fines and even culminating in the termination of the contract;

13.2.15. Assure the CONTRACTING PARTY the right to carry out an inspection at its facilities with its technical staff and/or the technical staff available at the Air Force Command, during the term of the Contract, in order to prove the full capacity for the execution of the contracted services, upon prior authorization from the CONTRACTING PARTY, and the CONTRACTOR must schedule the inspection within 48 hours;

13.2.16. The CONTRACTOR must present a training receipt with at least the following information:

13.2.16.1. Equipment used;

13.2.16.2. Number of training hours;

13.2.16.3. The squadron that conducted the training;

13.2.16.4. The date and time the training took place; It is

13.2.16.5. The signature of the crew that performed the training.

14. SUBCONTRACTING

14.1. The subcontracting of the object of this will not be allowed. Reference term.

15. SUBJECTIVE CHANGE

15.1. The merger, split or incorporation of the CONTRACTOR with/into another legal entity is admissible, provided that all the qualification requirements required in the original bidding are observed by the new legal entity, the other clauses and conditions of the contract are maintained, there is no prejudice to the execution of the agreed object and there is the express consent of the Administration to the continuity of the contract.



16. OVERSIGHT

16.1. The SUPERVISOR must be an employee of the Administration, specifically appointed by the Administration, in accordance with the precepts established by Law no.14.133, ICA No. 65-8/2009 and ICA No. 12-23/2019, in order to monitor and inspect compliance with the contract to be executed.

16.2. The inspection of the contractual execution consists of verifying the conformity of the services and the availability of resources, ensuring the perfect application of the adjustments, to be carried out by the INSPECTOR.

16.3. The representative of the contracting party must have the necessary experience to monitor and supervise the performance of the Contract.

16.4. Adequate verification of contractual compliance must be carried out based on the criteria established in the Reference terms and in accordance with the contractual terms.

16.5. Contractual performance must be monitored and inspected, including monitoring compliance with obligations arising from the contract.

16.6. An oversight shall include in its records all events related to the execution of the contract, taking the necessary measures to fully comply with contractual clauses. Measures that exceed its competence must be notified to the competent authority in a timely manner.

16.7. The monitoring and supervision of the contractual performance carried out by the CONTRACTING PARTY does not eliminate the CONTRACTOR's responsibility, including before third parties, for any irregularities, even those resulting from technical imperfections, failures or improper use of the equipment. In the event of such incidents, they do not imply the shared responsibility of the CONTRACTING PARTY, its representatives or employees.

17. ADMINISTRATIVE SANCTIONS

17.1. For the application of administrative sanctions, the following must be considered: the seriousness of the fault, the recurrence, the damage caused to the Public Interest and the damage caused to the Administration.

17.2. Failure to comply with contract in whole or in part or any breach of the obligations set out in contract and in this Notice, will subject the CONTRACTOR, without prejudice to other civil and criminal penalties, to any and all damages and resources available for contracting by the CONTRACTING PARTY, under the terms of contract applicable law, ensuring due process of law, to the following penalties:



17.2.1. Warning is the administrative sanction applied when the CONTRACTOR violates, for the first time, obligations related to the delay in contractual terms or incorrect presentation of an invoice, or even, for non-compliance with inspection guidelines within a period of up to 48 (forty-eight) days. hours, counted from the notification by the oversight. For the application of a Warning, a PAAI must be instructed.

17.2.2. A warning should not be proposed for cases of recurrence in the same species of breach of contractual obligation.

17.2.3. the fines for referring to the Art. 128 of Annex III of Ordinance GM-MD 5.175, of December 15, 2021, can be defined and applied:

17.2.3.1. A fine may be applied for partial non-execution of the adjustment in the amount of 0,5% (five tenths percent) of the value of the contract, if the CONTRACTOR fails to comply with any condition set in the contract; It is

17.2.3.2. When the CONTRACTOR causes the termination, a fine will be applied for total non-performance of the adjustment of 10% (ten percent) of the updated value of the contract, without prejudice to the fine for late payment or other sanctions dealt with in the Art. 128 of Annex III of Ordinance GM-MD 5.175, of December 15, 2021.

17.3. Given the prior defense of the interested party, within a period of 5 (five) working days, the fine for total or partial non-performance of the contract may be applied, together with the other administrative sanctions provided for in items I, II, III and IV, of the Art. 128 of Annex III of Ordinance GM-MD 5.175, of December 15, 2021.

17.4. CABW shall inform the CONTRACTOR the amount to be paid, after all administrative remedies and the right to full defense have been exhausted, and the CONTRACTING PARTY must deduct the amount of overdue installments.

17.5. After the actions mentioned in the previous items, if the refusal to pay the fine persists, the CABW Authorizing Officer (holder or delegate), as the case may be, will forward the process to the Attorney General of the National Treasury (PGFN) for analysis and registration of the company sanctioned in Union Active Debt (DAU) and/or initiate judicial enforcement, depending on the amount involved.

17.6. The application of a fine does not exempt the CONTRACTOR from repairing any damages, losses and losses that its punishable act may cause to the Administration, nor does it exclude the possibility of imposing other administrative penalties.



17.7. The application of the fines provided for in the previous items may be appealed within 5 (five) business days.

17.8. Due to total or partial non-performance of the contract, the Administration may, with prior defense guaranteed, apply to the contractor the impediment to contract with the Administration, within the scope of COMAER.

17.9. For the purpose of the provisions of this Notice, with regard to the application of the administrative sanction of impediment to contract with the Administration, the term “Administration” refers to COMAER.

17.10. Failure to perform the AGREEMENT means not completing the provision of the service in accordance with the technical specifications contained in this Public Notice.

17.11. Dishonest behavior is understood as the intentional conduct of trying to deceive or corrupt the Administration, or any of its agents, to obtain undue advantage.

17.12. OSPAWN application of the Declaration of Unsuitability will be forwarded to the Minister of Defense, via the chain of command and after opinion of the Adjunct Legal Consultancy of the Air Force Command (COJAER), in view of the exclusive competence of the Minister of Defense to apply the sanction. The application of this sanction occurs when framed in any of the situations below:

17.12.1. The company or professional has suffered a definitive conviction for the practice, by malicious means, of tax fraud in the collection of any taxes;

17.12.2. The company or professional has committed an unlawful act in order to thwart the objectives of the bidding process;

17.12.3. The Administration comes to find that the company or professional does not have the suitability to hire due to unlawful acts committed; or

17.12.4. Verification, by the Federal Court of Auditors, of the occurrence of proven fraud in bidding.

17.13. The criteria for the Declaration of Unsuitability, which cannot exceed 3 (three) years according to item III, Art. 163 of Law 14.133/2021, will be forwarded to COJAER, for subsequent referral to the Minister of State for Defence. Rehabilitation for this sanction may be requested by the interested party after 2 (two) years have elapsed from its application.

17.14. In the act of Declaration of Unsuitability, the application of the sanction will be suggested, which must be indicated in the respective PAAI, for the purpose of rehabilitation of the supplier, the amount to be reimbursed, with the legal additions due and any obligations.



18. MEASUREMENT CRITERIA

18.1. The evaluation of the execution of the object will use the Result Measurement Instrument (IMR), as provided for in Annex B10, to assess the quality of service provision.

18.1.1. The withholding or disallowance of payment will be indicated, proportional to the irregularity verified, without prejudice to the applicable sanctions, if it is found that the Contractor:

18.1.1.1. not producing the agreed results;

18.1.1.2. fail to perform, or fail to perform the contracted activities with the minimum quality required; or

18.1.1.3. fail to use materials and human resources required for the execution of the service, or use them with lower quality or quantity than demanded.

19. ANNEXES

The following annexes form an integral part of this Reference term, even if not transcribed:

ANNEX A1 – TECHNICAL SPECIFICATION;

APPENDIX B10 – RESULT MEASUREMENT INSTRUMENT (IMR); It is

APPENDIX C – FINANCIAL PHYSICAL SCHEDULE.

Brasilia, according to electronic signatures.

PRODUCED BY

(electronically signed)

VINICIUS IRINEU CAMPOS Cap Av
Head of the GTE Training Contracts Subsection

(electronically signed)

RENAN DA SILVA DE SOUZA Cap Av.
Head of the GTE's Planning, Budget and Management Office



(electronically signed)

IGOR PINHO DE SOUZA Maj Av
Head of the GTE-1 Operations Section

APPROVED BY

I, Lieutenant Colonel Av RODRIGO SIMÕES DE OLIVEIRA PINTO, Group Expense Officer of Special Transport, I approve this Term of Reference and Annexes, motivated by the exposed in its section 2, and lavro this statement which is signed by me.

(electronically signed)

RODRIGO SIMÕES DE OLIVEIRA PINTO Ten Cel Av
GTE Expense Controller



MINISTÉRIO DA DEFESA
COMANDO DA AERONÁUTICA

CONTROLE DE ASSINATURAS ELETRÔNICAS DO DOCUMENTO

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**DEFENSE MINISTRY
AERONAUTICS COMMAND
GROUP OF SPECIAL TRANSPORT**

ANNEX A - TECHNICAL SPECIFICATION

1. Type of equipment – aircraft:
 - 1.1. FSS - EMB-190 / VC-2 aircraft flight simulator.
2. Categoria: (“Category”):
 - 2.1. FFS EMB-190 Level D.
3. Number of axes:
 - 3.1. 3 (three) axes.
4. Simulator degrees of freedom:
 - 4.1. 6 (six) degrees of freedom.
5. Visual (day, night):
 - 5.1. Yes/ Night.
6. Training period:
 - 6.1. May 2023 to May 2024.
7. Operational capability for VFR/IFR flight:
 - 7.1. VFR It is IFR.
8. “Dry” or “wet” training:
 - 8.1. DRY training:
9. “FTD” need:
 - 9.1. HEAD UP DISPLAY (HGS COMBINER).
10. Number of hours of flight simulator training for the training period:



10.1. 280 hours – DRY

11. Hiring requirement:

11.1.1. The simulation equipment should offer scenarios of the South American territory, with emphasis on the following airports: SBBR, SBSP, SBGR, SBGL and SBRJ.

11.1.2. For training purposes, pilots can perform the following maneuvers on the simulation equipment:

- 11.1.2.1. Flight preparation procedures, including pre-flight inspections, engine operation and aircraft systems;
- 11.1.2.2. Rolling and operations on the surface of the airport;
- 11.1.2.3. Normal takeoffs and landings, with crosswinds and/or with some type of failure in the various equipment and systems of the aircraft (engine failure in flight, engine fire in flight, tripping of trim tabs, electrical failures, failures in the pressurization system, failures in the hydraulic system, etc.);
- 11.1.2.4. Maximum performance takeoffs (short runway and overcoming obstacles);
- 11.1.2.5. Flight with or without autopilot;
- 11.1.2.6. Air traffic circuits, including entry and exit procedures, proper operation of the MFD's 'TERRAIN' mode for information on mountainous regions;
- 11.1.2.7. Straight and level flight;
- 11.1.2.8. Airplane control and maneuvers through external visual references;
- 11.1.2.9. Climbs and rising curves;
- 11.1.2.10. Descents with and without turns using high and low resistance settings;
- 11.1.2.11. Flights with different speeds, from cruising to minimum controlled speed;



- 11.1.2.12. Flight at low critical speeds, recognition and recovery from pre-stall, full stall and spin;
- 11.1.2.13. Flight with asymmetric power;
- 11.1.2.14. Emergency procedures and malfunctions of aircraft equipment and systems;
- 11.1.2.15. Air traffic circuits, including entry and exit procedures, ways to avoid collisions and aircraft wake turbulence;
- 11.1.2.16. Instrument approach training (NDB, VOR, RNAV and ILS);
- 11.1.2.17. Approaches to the landing area with engine power at idle, with partial power and single engine;
- 11.1.2.18. I glide for landing;
- 11.1.2.19. Missed approaches from final approach to touchdown in various flight configurations, including turns;
- 11.1.2.20. Ability to train instrument procedures under CAT II and CAT III conditions;
- 11.1.2.21. Forced landing procedures, starting from: a takeoff, during the initial climb; since the cruise flight; and from the descent and landing transit;
- 11.1.2.22. Stall entries from various attitudes and power combinations with recovery starting at the first indication of stall and recovery from a full stall;
- 11.1.2.23. Recovery of the aircraft from a stall or from entering an abnormal attitude;
- 11.1.2.24. Recognition and management of threats and errors;
- 11.1.2.25. Operations at aerodromes and in traffic circuits; collision avoidance precautions and procedures;
- 11.1.2.26. Flight at low critical speeds, pre-stall recognition and recovery, full stall;



- 11.1.2.27. Short runway landings;
- 11.1.2.28. Basic flight maneuvers and abnormal attitude recovery by reference to basic flight instruments only;
- 11.1.2.29. Flight navigation through visual references, estimated navigation and with the aid of radio navigation;
- 11.1.2.30. Emergency operations, including simulated aircraft equipment failures;
- 11.1.2.31. Operations with origin, destination or transit through controlled aerodromes, complying with the procedures of the air traffic control services and the radio communication procedures and phraseology; It is
- 11.1.2.32. Procedures and phraseology for communications.



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**DEFENSE MINISTRY
AERONAUTICS COMMAND
GROUP OF SPECIAL TRANSPORT**

**RESULT MEASUREMENT INSTRUMENT (IMR)
(Evaluation of the quality of Services)**

Nº. 01 Compliance with contracted hours	
Item	Description
Goal	Ensure compliance with contracted hours.
Goal to meet	100%
Measuring instrument	Simulator Training Report - RTS (Annex D of ICA 12-26/2016).
follow-up form	Conference of RTS received.
Frequency	With each training performed.
Calculation Mechanism	Each RTS will be checked for the observations entered in the "FLY HOURS" and "AMENDMENTS" fields. $QTY \text{ of effective training hours} / QTY \text{ of hours planned} = N$
Effective Date	Training start date.
Payment adjustment ranges	$N > 0,9$ - 100% From 0.7 to 0.9 - N multiplied by the NF value. $N < 0.7$ - Contractor must reallocate the training slot.
sanctions	Contractor shall bear the expenses with food, accommodation and transportation of the members of the Contracting Party involved if it is not possible to reschedule until the last day scheduled for the training of the group in question.
Comments	In the hours of effective training, the period in which the simulator is stopped due to equipment breakdowns.

Brasilia, according to the date of the electronic signature.

PRODUCED BY

(electronically signed)

VINICIUS IRINEU CAMPOS Capt.
Head of the GTE Training Contracts Subsection

(electronically signed)

RENAN DA SILVA DE SOUZA Capt.
Head of the GTE's Planning, Budget and Management Office

(electronically signed)

IGOR PINHO DE SOUZA Maj.
Head of the GTE-1 Operations Section

APPROVED BY

(electronically signed)

RODRIGO SIMÕES DE OLIVEIRA PINTO Lt. Col.
GTE Commander



MINISTÉRIO DA DEFESA
COMANDO DA AERONÁUTICA

CONTROLE DE ASSINATURAS ELETRÔNICAS DO DOCUMENTO

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**DEFENSE MINISTRY
AERONAUTICS COMMAND
GROUP OF SPECIAL TRANSPORT**

FINANCIAL PHYSICAL SCHEDULE

ITEM	DESCRIPTION	QTY	UNIT VALUE (USD)	Deadline for Execution	Deadline for Payment
01	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	280 hours	714,98	(* D + 12 months	(**) D + 30 days
	TOTAL		200.194,03		

***D = Contract signing date**

****D= Invoice Receipt Date**

The execution phase of the contract is subject to the appointments of the Air Unit of the crew and may be modified during the execution of the contract according to the need for training and financial forecast.

FINANCIAL PHYSICAL SCHEDULE

ITEM	DESCRIPTION	QTY	VALOR (USD)	Deadline for Execution	Deadline for Payment
01	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	MAY 2023	JUN 2023
02	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	JUN 2023	JUL 2023
03	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	JUL 2023	AGO 2023
04	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	AGO 2023	SET 2023
05	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	SET 2023	OUT 2023
06	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	OUT 2023	NOV 2023

07	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	32 hours	22.879,36	NOV 2023	DEC 2023
08	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	16 hours	11.439,68	DEC 2023	JAN 2024
09	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	16 hours	11.439,68	JAN 2024	FEV 2024
10	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	8 hours	5.719,84	FEV 2024	MAR 2024
11	Flight Simulator Training Aeronave VC-2 (EMB 190/195) (DRY)	16 hours	11.439,68	MAR 2024	ABR 2024
	TOTAL		200.194,03		

The execution phase of the contract is subject to the appointments of the Air Unit of the crew and may be modified during the execution of the contract according to the need for training and financial forecast.

Brasilia, according to the date of the electronic signature.

PRODUCED BY

(electronically signed)

VINICIUS IRINEU CAMPOS Cap Av
Head of the GTE Training Contracts Subsection

(electronically signed)

RENAN DA SILVA DE SOUZA Cap Av.
Head of the GTE Planning, Budget and Management Office

(electronically signed)

IGOR PINHO DE SOUZA Maj Av
Head of the GTE-1 Operations Section

APPROVED BY

(electronically signed)

RODRIGO SIMÕES DE OLIVEIRA PINTO Ten Cel Av
GTE Commander



MINISTÉRIO DA DEFESA
COMANDO DA AERONÁUTICA

CONTROLE DE ASSINATURAS ELETRÔNICAS DO DOCUMENTO

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