

No. 11919

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**BRAZIL**  
and  
**FEDERAL REPUBLIC OF GERMANY**

**Agreement concerning geological and geophysical prospecting in the State of Minas Gerais and in part of the State of Espírito Santo by a Brazilian-German Mixed Commission. Signed at Bonn on 1 June 1970**

*Authentic texts : Portuguese and German.*

*Registered by Brazil on 18 August 1972.*

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**BRÉSIL**  
et  
**RÉPUBLIQUE FÉDÉRALE D'ALLEMAGNE**

**Accord relatif à l'exécution de recherches géologiques et géophysiques dans l'État de Minas Gerais et dans une partie de l'État d'Espírito Santo par une Commission mixte germano-brésilienne. Signé à Bonn le 1<sup>er</sup> juin 1970**

*Textes authentiques : portugais et allemand.*

*Enregistré par le Brésil le 18 août 1972.*

[TRANSLATION — TRADUCTION]

AGREEMENT<sup>1</sup> BETWEEN THE GOVERNMENT OF THE FEDERATIVE REPUBLIC OF BRAZIL AND THE GOVERNMENT OF THE FEDERAL REPUBLIC OF GERMANY CONCERNING GEOLOGICAL AND GEOPHYSICAL PROSPECTING IN THE STATE OF MINAS GERAIS AND IN PART OF THE STATE OF ESPÍRITO SANTO BY A BRAZILIAN-GERMAN MIXED COMMISSION

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The Government of the Federative Republic of Brazil and the Government of the Federal Republic of Germany, desiring to co-operate in geological and geophysical prospecting in the State of Minas Gerais and in part of the State of Espírito Santo, have concluded the following Supplementary Agreement to the Basic Agreement on technical co-operation of 30 November 1963 :<sup>2</sup>

*Article 1*

The Brazilian-German Mixed Commission shall carry out in the territory of the State of Minas Gerais, except in the part thereof which lies to the west of meridian 48° W, and in the territory of the State of Espírito Santo, except in the part thereof which lies to the east of the Vitória meridian, the following geological and geophysical prospecting activities :

- (a) A systematic aerial geophysical survey involving magnetometer and scintillation counter readings;
- (b) A supplementary aerial geophysical survey of regions with anomalies, including the use of electro-magnetic measuring techniques;
- (c) A follow-up survey of the promising regions discovered by means of aerial geophysical prospecting to be effected by means of ground geophysical surveys involving, as may be necessary, the use of magnetometry, scintillometry, gravimetry or geoelectrical measuring techniques;
- (d) The geological mapping of deposits and geological surveys to make clear the general geological structure.

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<sup>1</sup> Came into force on 15 July 1970, the date of the notification by the Government of Brazil to the Government of the Federal Republic of Germany that the legal and procedural requirements had been met in Brazil, in accordance with article 14.

<sup>2</sup> United Nations, *Treaty Series*, vol. 657, p. 301.

### Article 2

(1) In the event that it is not possible to collect, process, interpret and store the information and data resulting from the aerial and ground geophysical activities in a geophysical centre or other competent Brazilian institution, the following solution shall be applied :

- (a) Processing and interpretation of the aerial geophysical measurements in the Federal Republic of Germany by a German enterprise;
- (b) Processing and interpretation of the ground geophysical data at the Computer Centre of the German Federal Geological Service at Hanover;
- (c) Processing of the geochemical survey data in the laboratories of the aforementioned Federal Geological Service.

(2) In the event that the data obtained are processed and interpreted outside Brazil, these operations shall be carried out jointly by Brazilian and German specialists. The Brazilian specialists who participate in the interpretation must hold a university degree in professional scientific studies, the curriculum to have included physics, geophysics or mathematics, and must, in addition, have a sound knowledge of the German and/or English language(s). Interpretation of the survey results shall commence four months after the start of flying and shall last approximately 18 months. The Government of the Federative Republic of Brazil undertakes to pay the travel and subsistence costs of the Brazilian specialists to be employed in the interpretation.

(3) Up to six of the specialists referred to in article 8, paragraph (1) (a), of this Agreement shall, within the eighteen-month data-interpretation period, receive complete training in a six-month course in the Federal Republic of Germany in the interpretation of aerial geophysical data.

(4) The interim and final results shall be assembled in a series of comprehensive reports prepared jointly by Brazilian and German specialists for the Government of the Federative Republic of Brazil. Partial or total publication of these reports shall take place only with the express authorization of the Government of the Federative Republic of Brazil.

### Article 3

(1) The Brazilian-German Mixed Commission shall consist of the group of German specialists to be sent to Brazil in accordance with article 4, paragraph (1), and of the Brazilian group referred to in article 8, paragraph (1) (a). The Mixed Commission shall commence its work under the direction of a Co-ordinator appointed by the Brazilian Government.

(2) The afore-mentioned Co-ordinator shall supervise the implementation

of this Agreement and shall ensure the execution of agreed measures. In addition, he shall protect the interests of the Ministry of Mines and Energy during the term of the Agreement.

(3) In the course of the implementation of this Agreement, the heads of the Brazilian and German groups shall meet periodically under the chairmanship of the Brazilian Co-ordinator for the purpose of taking decisions with regard to the operation of the Agreement, such as the delimitation of areas of activity, the definition of priorities, the selection of areas for ground surveys, the nature of the services to be performed and the exclusion of areas which prove to be of no interest.

(4) The head of the group of German specialists shall be competent to plan and choose the working methods and techniques to be applied in the areas selected.

(5) The headquarters of the Brazilian-German Mixed Commission shall be at Belo Horizonte.

#### *Article 4*

(1) The Government of the Federal Republic of Germany shall send to Brazil at its own expense :

(a) A group of German specialists, consisting of a geological working group and a ground geophysical working group, for a period of up to three years;

(b) An aerial geophysical working group (enterprise under contract).

(2) The geological and ground and aerial geophysical working groups shall conduct their activities in the following manner :

(a) The geological working group, which shall consist during the first year of two scientists and two engineers, shall be enlarged during the second and third years, depending on the progress made, to a total of six scientists and six engineers;

(b) The ground geophysical working group, which shall consist of up to three scientists and up to three engineers, shall carry out ground geophysical surveys during the second and third years;

(c) The aerial geophysical working group, consisting of two scientists, four engineers, four technicians and the flying and maintenance personnel (two pilots, two co-pilots and radio operators, two flight mechanics), shall carry out the flights and aerial geophysical surveys planned for the first working year. During the second and third years, the aerial geophysical working group shall consist of up to two scientists and up to eight engineers and shall carry out the interpretation of the results of the special aerial geophysical survey flights as well as the training of the Brazilian crews for the survey aircraft and of the Brazilian geophysicists.

(3) In the execution of the project, use shall also be made, as the need arises, of scientists, engineers and experts for special surveys and of two specialized administrative officers.

#### *Article 5*

(1) The group of German specialists shall train a total of up to 15 Brazilian geologists, physicists, geophysicists or engineers in the use of the aerial and ground geophysical survey instruments and in the interpretation of the surveys made as part of their programme in order to enable the Brazilian experts to continue the geophysical surveys without assistance.

(2) The Government of the Federative Republic of Brazil shall select the specialists for the training referred to above and shall ensure that they are available at the appropriate time.

#### *Article 6*

(1) During the first working year, the survey flights shall be carried out by a German enterprise under contract, using two aircrafts and the necessary equipment.

Upon the completion of the planned regional geophysical survey flights (totalling 215,000 km), one of the aircraft together with its equipment shall be returned to the Federal Republic of Germany.

(2) During the second and third working years, the Government of the Federal Republic of Germany shall make available the aircraft remaining in Brazil as well as a helicopter, both fitted with the equipment required for the continuation of the work.

(3) The Government of the Federal Republic of Germany shall supply at its own expense, c.i.f. port of discharge, the technical apparatus, laboratory equipment and aircraft required for the conduct of the survey flights and the surveys. Upon the completion of the work of the group of German specialists, these items shall become the property of the Federative Republic of Brazil, subject to the condition that they shall be placed at the disposal of the Ministry of Mines and Energy for the purpose of establishing a geophysical survey centre.

#### *Article 7*

The Government of the Federative Republic of Brazil shall :

(a) In accordance with the provisions of article 1, paragraph 2, and article 4, paragraph 2, of the Basic Agreement of 30 November 1963 referred to above, grant exemption from import licence, proof of foreign exchange allocation, payment of consular fees, customs duties and other taxes or

- charges levied on the purchase, consumption and sale of goods, and grant similar exemptions in respect of the re-export of machinery, apparatus or other items;
- (b) Ensure the rapid transport of the equipment referred to in article 6, paragraph (3), from the port of discharge to the place of use and bear the transport costs;
  - (c) Be responsible for the satisfactory operation and maintenance of the aircraft provided by the Government of the Federal Republic of Germany and bear the corresponding costs, including those for fuel and lubricants;
  - (d) Grant exemption from charges in respect of the aforementioned aircraft and their pilots, including exemption from landing and take-off fees;
  - (e) Grant the licences required for the conduct by the afore-mentioned aircraft and their pilots of the aerial and ground geophysical surveys and aerial geophysical measurements;
  - (f) Grant a licence for radiotelegraphy on two frequencies in the short-wave band and a licence for radiotelephony in the ultrashort-wave band for all the working groups.

#### *Article 8*

(1) The Government of the Federative Republic of Brazil shall, at its own expense, make available for the conduct of the flights, ground surveys and other work during the first, second and third years the following specialized and auxiliary personnel :

- (a) Up to 15 specialists with appropriate training in geology or geophysics;
- (b) For the geological working group : up to three interpreters from Portuguese and German, up to 11 drivers and, on a temporary basis, up to 50 manual workers;
- (c) For the aerial geophysical working group : two interpreters, four drivers, two manual workers and, during the second and third working years, two pilots, two navigators and two flight mechanics;
- (d) For the ground geophysical working group : one interpreter, eight drivers and three assistants during the second and third working years;
- (e) At such time as the administrative officers enter upon their duties : one interpreter, two or three typists familiar with the Portuguese and German languages, two or three drivers and two assistants.

(2) Accordingly, the following personnel shall be made available during the first, second and third years :

	<i>First year</i>	<i>Second year</i>	<i>Third year</i>
Scientists or engineers . . . . .	6	10	15
Interpreters . . . . .	4	6	7
Typists . . . . .	2	3	3
Drivers . . . . .	10	22	26
Assistants . . . . .	2	5	5
Pilots . . . . .	—	2	2
Navigators . . . . .	—	2	2
Flight mechanics . . . . .	—	2	2
Manual workers . . . . .	32	42	52

#### *Article 9*

(1) The Government of the Federative Republic of Brazil shall, at its own expense, make available the following appropriately furnished and equipped working facilities and equipment and shall bear the corresponding operating and maintenance costs:

(a) For the geological working group and, as necessary, for the administrative officers at Belo Horizonte, from the first to the third working year :

Four to 10 offices;  
 One secretariat office;  
 One meeting room;  
 One drawing office;  
 Three laboratories;  
 One collection room (rock samples);  
 One workshop;  
 Two store-rooms (equipment and spare parts);  
 Six to 14 garages or safe parking places.

(b) For the ground geophysical working group at Belo Horizonte, during the second and third working years :

Five offices;  
 One drawing office;  
 One laboratory;  
 One workshop;  
 One store-room;  
 Eight garages or safe parking places.

(c) For the geological and geophysical prospecting in the field, from the first to the third working year, for from two to nine teams which shall work separately :

Two work rooms;  
 One store-room;  
 Three motor-vehicle parking places.

(d) For the aerial geophysical working group at the appropriate airport in the area being surveyed, during the first working year, for each of the two groups :

- One office;
- One secretariat office;
- One drawing office;
- One workshop;
- One store-room;
- One aircraft hangar;
- Two garages or safe parking places.

(2) The facilities referred to in paragraph (1) (d) above will be required during the second and third working years, in the same number, for the continuation of the aerial geophysical survey flights by the Brazilian and German specialists.

(3) The working places referred to in paragraph (1) (a), (b), (c) and (d) shall possess an uninterrupted supply of electric current and of piped drinking water as well as a telecommunications (telephone/telegraph) system providing 24-hour service.

#### *Article 10*

(1) The Government of the Federative Republic of Brazil shall, at its own expense, make available the following vehicles with drivers :

(a) For the geological working group and, as necessary, for the administrative officers, during the first working year : four rough-terrain vehicles, two supply vehicles;

During the second working year : seven rough-terrain vehicles, three supply vehicles;

During the third working year : eleven rough-terrain vehicles, three supply vehicles;

(b) For each of the two teams of the aerial geophysical working group, from the first to the third working year :

two motor cars, two utility vehicles;

(c) For the ground geophysical group, during the second and third working years :

four rough-terrain vehicles, three rough-terrain break-down vehicles, one supply vehicle or lorry.

(2) Accordingly, the following vehicles shall be made available during the first, second and third working years :

	<i>First year</i>	<i>Second year</i>	<i>Third year</i>
Rough-terrain vehicles . . . . .	6	13	17
Utility and supply vehicles . . . . .	4	6	6
Rough-terrain break-down vehicles . . .	—	3	3



(3) The Government of the Federative Republic of Brazil shall bear the operating and maintenance costs of the afore-mentioned vehicles, including those for fuel and lubricants, and shall ensure the normal running of the vehicles.

#### *Article 11*

(1) The Government of the Federative Republic of Brazil shall provide a special identity card for the German specialists. This shall, in particular, guarantee that the German specialists :

- (a) Have access to such technical reports as are available and are necessary for the performance of their duties;
- (b) Are able to examine the topographical maps, photomosaics and aerial photographs of the working areas.

(2) The Government of the Federative Republic of Brazil shall ensure that the funds required for the services for which it is responsible under this Agreement are available at the appropriate time.

#### *Article 12*

The Contracting Governments shall, as soon as possible after the signing of this Agreement, appoint representatives for the purpose of forming a working group, which shall, not later than 90 days after its first meeting, submit a plan setting out the details of the implementation of the Agreement.

#### *Article 13*

The provisions of the Basic Agreement of 30 November 1963 shall apply to this Agreement.

#### *Article 14*

The Government of the Federative Republic of Brazil shall notify the Government of the Federal Republic of Germany as soon as the legal and procedural requirements for the entry into force of this Agreement have been met in Brazil. The Agreement shall enter into force on the date of such notification.

#### *Article 15*

The Ministry of Mines and Energy shall be responsible for the implementation of this Agreement on behalf of the Government of the Federative Republic of Brazil.

DONE at Bonn on 1 June 1970 in four original copies, two in the Portuguese language and two in the German language, both texts being equally authentic.

For the Government  
of the Federative Republic of Brazil :      For the Government  
of the Federal Republic of Germany :

ANTÔNIO DIAS LEITE JÚNIOR

SIGISMUND Freiherr VON BRAUN

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