



# **International Boundary Study**

**No. 65 – February 28, 1966**

## **Chile – Peru Boundary**

**(Country Codes: CI-PE)**

**The Geographer  
Office of the Geographer  
Bureau of Intelligence and Research**

**INTERNATIONAL BOUNDARY STUDY**

**No. 65**

**CHILE - PERU BOUNDARY**

**TABLE OF CONTENTS**

	<b><u>Page</u></b>
<b>I. Boundary Brief.....</b>	<b>2</b>
<b>II. Historical Background.....</b>	<b>2</b>
<b>III. Geographic Setting.....</b>	<b>5</b>
<b>IV. Boundary Alignment .....</b>	<b>5</b>
<b>V. Present Situation.....</b>	<b>6</b>
<b>Appendix .....</b>	<b>7</b>
<b>I. Final Act on the Boundary Demarcation.....</b>	<b>7</b>
<b>II. Documents.....</b>	<b>13</b>
<b>III. Maps.....</b>	<b>14</b>

## **CHILE - PERU BOUNDARY**

### **I. BOUNDARY BRIEF**

Demarcated throughout by pillars, the Chile - Peru boundary has a length of approximately 106 miles. It was delimited by a treaty between the two states on June 3, 1929. Eastward from the Pacific Ocean, the boundary traverses the northern edge of the Atacama Desert and extends to the Bolivia tripoint in the Andes Mountains.

### **II. HISTORICAL BACKGROUND**

Prologue to the establishment of the Chile - Peru boundary, the two states were separated by the maritime territory of Bolivia. Following the independence of Chile and Peru in 1818 and 1824 respectively, Bolivia on August 6, 1825 also achieved independence from Spain and, in accordance with the Uti-Possidetis Juris of 1810, took possession of the territories that corresponded to its colonial administration. At this time Bolivia claimed the territory westward from the Andes to the Pacific Ocean between the Rio Salado on the south and the Rio Loa on the north, which included part of the Atacama Desert.

With the discovery and exploitation of nitrate deposits Chile made claims to the Bolivian administered part of the Atacama Desert in 1842. Following negotiations extending over several decades, a settlement was reached between Bolivia and Chile in a treaty dated August 10, 1866. Article 1 of the treaty stated that "the line of demarcation of boundaries between Chile and Bolivia in the desert ... shall henceforth be, the parallel of latitude 24 degrees South." On December 5, 1872, a subsequent treaty confirmed the 24th parallel as the boundary between the two states. In accordance with various other treaties, Bolivia was given an equal share of revenues from guano deposits located in Chilean territory between the 24th and 25th parallels; and Chile had the same concession in Bolivian territory between the 24th and 23rd parallels, which area included the port of Antofagasta.

In 1872 the Government of Bolivia granted a concession to a British firm to develop the nitrate deposits in Bolivian territory for a period of 15 years. The following year a defensive alliance was signed by Peru and Bolivia at Lima. The alliance between the two states was to guarantee the independence, sovereignty, and integrity of their respective territories. In 1878 Bolivia placed a minimum tax on the production of the nitrate firm. In the intervening time, the concession had been transferred to a Chilean company making the leveling of the tax a violation of the treaty of 1866, in which Bolivia had agreed not to increase taxes on the industry without the approval of Chile. Despite a Bolivian offer to arbitrate the minimum tax, Chile occupied part of the Bolivian coastal area in February, 1879. Chile asked Peru for a proclamation of neutrality, but as the latter did not respond Chile declared war on both Peru and Bolivia on April 5, 1879 precipitating the so-called War of the Pacific.

The Treaty of Ancon ended the conflict between Peru and Chile on October 20, 1883, and a truce was signed by Bolivia and Chile at Valparaiso on April 4, 1884. In accordance with

the terms of the truce, Chile was to administer Bolivian territory from the 23rd parallel northward to the Rio Loa, which deprived Bolivia of the northern part of the province of Antofagasta and a Pacific littoral. The eastern boundary of the territory was given as a series of straight-line segments extending northward between stated points from Cerro Zapaleri (Sapaleri) on the Argentine boundary through Cerro Licancabur, Cerro Cabana, most southerly bay head of Salar de Ascotan, Volcan Oyahue (Volcan Ollague), and Volcan Tua, and then by the boundary between the former Peruvian province of Tarapaca and Bolivia. On May 18, 1895, a treaty signed by Chile and Bolivia confirmed the latter's loss of the territory between the 23rd parallel and the Rio Loa. A second treaty also was signed on the 18th by the two states that promised to transfer Tacna and Arica to Bolivia should Chile obtain them, or if not, the Caleta de Vitor, a small port south of Arica.

On October 20, 1904, a peace treaty between Chile and Bolivia delimited the boundary through 96 specified points between Cerro Zapaleri on the Argentina tripoint and Cerro Chipe. Provision was made in the treaty for demarcation and boundary pillars were erected shortly thereafter. Chilean sovereignty was recognized by Bolivia over the territory from the ocean to the existing Argentine boundary between the 23rd and 24th parallels which included the port of Antofagasta. Chile also recognized the right of Bolivia in perpetuity to commercial transit through its territory and ports, to be regulated by special agreements.<sup>1</sup> Minor modifications were made to the boundary by the protocol of May 1, 1907.

In accordance with the terms of the Treaty of Ancon, Peru ceded unconditionally to Chile the littoral province of Tarapaca, bounded north by the Rio Camarones, south by the Rio Loa, east by Bolivia, and west by the Pacific Ocean. The provinces of Tacna and Arica, bounded north by the Rio Sama from its source in the mountains adjoining Bolivia to the sea, south by the Rio Camarones, east by Bolivia and west by the ocean, were to be administered by Chile for a 10-year period, followed by a plebiscite to determine whether these provinces would remain permanently under Chilean administration or if they would continue to be part of Peruvian territory.

In 1885 Chile placed formally the area surrounding Tarata, in the province of Tacna, under its administration. Following a Peruvian protest that the action was not in accordance with the Treaty of Ancon, Chile replied that the area was south of the course of the Rio Sama, which was the northern boundary of Chilean administration under the treaty. Peru declared the Rio Estique flowed westward from the Andes to form the Rio Sama and was the treaty boundary, whereas, Chile interpreted the course of the Rio Sama to include the Rio Chaspaya as the principal source and continued to administer Tarata.

Efforts to reach an agreement on the terms of a plebiscite were unsuccessful, and Chile remained in possession of Tacna and Arica despite the 10-year stipulation in the Treaty of Ancon. On November 1, 1920, Peru presented to the League of Nations a request that the Assembly revise the treaty, however, the request was withdrawn the following month. On

---

<sup>1</sup> A railroad from Antofagasta reached Uyuni on the Bolivian Plateau in 1889.

December 12, 1921, Chile asked Peru to agree on arrangements for a plebiscite, but the latter instead proposed an arbitration under the auspices of the United States. President Warren G. Harding on January 21, 1922, invited the governments of Chile and Peru to send delegates to Washington to devise a means of reaching an agreement. Bolivia asked to be admitted to the negotiations but both Chile and Peru dissented.

Chilean and Peruvian delegates arrived in Washington on May 15, 1922 and a series of conferences were held with the Secretary of State Hughes. Two months later the delegates asked informally that President Harding act as arbitrator. On July 20, 1922, a protocol of arbitration and a complementary act defining the scope of the arbitration were signed. The protocol stated that the only difficulties of the Treaty of Ancon on which disagreement existed concerned the ownership of the territories of Tacna and Arica, and that these difficulties were to be submitted to the arbitration of the President of the United States. The complementary act agreed the arbitrator was to decide whether or not a plebiscite should be held and claims relative to Tarata were to be allowed in accordance with the final disposition of Tacna and Arica.

On March 4, 1925, President Calvin Coolidge handed down the Washington arbitral award which called for a plebiscite to be held in the disputed area. The plebiscite was to include the provinces of Tacna and Arica as comprised on October 20, 1883, bounded north by the Rio Sama and south by the province of Tarapaca. The arbitrator reserved the right to appoint a special commission to determine the boundaries of the plebiscite area relative to Tarata. On September 1, 1925, in the presence of a plebiscitary commission presided over by General Pershing, Chile delivered Tarata over to Peru in accordance with an arbitral decision. Despite difficulties the commission continued to operate until the summer of 1926 at which time attempts to arrange a plebiscite were suspended.

The United States Secretary of State Kellogg on November 30, 1926, renewed a proposal for settlement by the transfer of the disputed territory to Bolivia, which was rejected by both Peru and Chile. On July 9, 1928, Secretary Kellogg suggested direct negotiations be held, and diplomatic relations between the two states, severed since March 19, 1910, were resumed on October 3, 1928. In the exercise of good offices on May 14, 1929, President Herbert Hoover proposed final bases for a settlement, which resulted in ending the long dispute. In a treaty signed at Lima on June 3, 1929, Article 2 delimited the international boundary dividing the disputed territory of Tacna and Arica between Peru and Chile. A complementary protocol signed on the same day as the treaty stated in Article 1 that neither government might without previous agreement with the other cede to any third state all or any part of the territory which, in accordance with the treaty, remained under their respective sovereignties. In Article 2 of the protocol, port facilities granted to Peru under Article 5 of the treaty should consist of free transit

to Peruvian territory and from such across Chilean territory.<sup>2</sup> The placing of pillars marking the boundary was completed the following year and a demarcation protocol was signed at Lima on August 5, 1930.

### **III. GEOGRAPHIC SETTING**

The Chile - Peru boundary extends eastward from sea level on the Pacific coast to an elevation of more than 18,000 feet on the snow-covered Nevado el Fraile and 13,000 feet at the Bolivia tripoint. Inland the Atacama Desert has a flat to gently rolling surface of sands, gravels, salt plains (salars), pebble pavements, and rock hills or ridges. The Andes rise steeply above the desert and are characterized by high peaks and spectacular vistas.

The Atacama Desert is one of the driest areas in the world and precipitation is practically nil. In addition to contributing to the aridity, the cold Peruvian current tends to keep temperatures relatively low with small monthly ranges. At Arica July and August are the coolest months with a mean temperature of 60°F and February is the warmest month with a mean temperature of 72°F. Although cloud cover is about three tenths in February, Arica often has a higher ratio of cloud cover in winter but a mean frequency of only one day of fog a year. Except for stream courses and places with a high water table, the vegetation is meager or entirely lacking. In some areas lichens, cacti, and low herbaceous plants grow with acacias and mimosas limited to the better watered tracts. With the ascent of the Andes, precipitation increases and at an elevation of some 8,000 to 10,000 feet short grasses are suitable for sheep pasturage. Snow caps the high mountain peaks throughout the year.

Except for Tacna and Arica, there are only small towns and clusters of habitations adjacent to the boundary. The small towns are used by mining concerns or serve as trading centers for people engaged in pastoralism or limited irrigation farming. In addition to the Tacna - Arica railroad, a number of automobile roads and tracks cross the boundary, of which the Pan-American Highway is the most important. The Arica - La Paz railroad, including a mining spur, parallels the boundary.

### **IV. BOUNDARY ALIGNMENT**

Article 2 of the treaty signed at Lima on June 3, 1929 affords the delimitation of the boundary as follows:<sup>3</sup>

The territory of Tacna and Arica shall be divided in two parts, Tacna going to Peru and Arica to Chile. The dividing line between the above two parts and,

---

<sup>2</sup> Peru continued to use the port of Arica as the terminus of the railroad from Tacna. Bolivia also utilized Arica as a railroad terminus with the completion of the La Paz line in 1913.

<sup>3</sup> The "Final Act of the Boundary Demarcation" which includes a detailed description of the monuments marking the Chile - Peru boundary is contained in the Appendix.

consequently, the frontier between the territories of Chile and Peru, shall start from a point on the coast, to be named "Concordia," 10 kilometres to the north of the bridge over the Rio Lluta, continuing eastwards parallel to the line of the Chilean section of the Arica - La Paz railway and distant 10 kilometres from the same, with such deflections as may be necessary to utilize, in demarcation, the local geographical features so as to leave in Chilean territory the Tacora sulphur mines and their appurtenances. The line shall then pass through the centre of the Laguna Blanca in such a manner as to leave one part in Chile and the other in Peru. Chile cedes to Peru in perpetuity all rights over the channels of Uchusuma and Mauri, also called Azucarero, without prejudice to the sovereignty which she will be entitled to exercise over that part of the above-mentioned aqueducts which shall remain in Chilean territory after the dividing line referred to in the present article has been traced. Chile grants to Peru in perpetuity the fullest rights of user over that portion of both channels which traverses her territory, including the right to widen the existing channels, to modify their course, and to utilize all the water supplies available in their passage through Chilean territory, with the exception of those which at present flow into the Rio Lluta and those which supply the Tacora sulphur mines.

## **V. PRESENT SITUATION**

There are no known disputes relative to the alignment of the Chile - Peru boundary.

## APPENDIX

### I. Final Act on the Boundary Demarcation

The undersigned, Conrado Rios Gallardo, Ambassador Extraordinary and Plenipotentiary of Chile, and Dr. Pedro M. Oliveira, Minister of Foreign Affairs of Peru, having met in the Ministry of Foreign Affairs of Peru in order to implement the provisions of Article 4, part 2, of the Treaty between the two countries signed on June 3, 1929, and, pursuant to the agreement contained in the Act Regarding the Delivery of Territories, signed at Tacna by Delegates of Chile and Peru on August 28, 1929, their full powers having been exhibited and exchanged and having been found to be in good and due form, attest that a detailed list giving the location and definitive characteristics of the monuments that mark the Chilean - Peruvian boundary, beginning, in order, at the Pacific Ocean, is as follows:

<u>Number</u>	<u>Type</u>	<u>Latitude and Longitude</u>	<u>Location</u>
<u>1</u> *	Concrete	18-21-03 70-22-56	The ocean shore
<u>2</u>	Iron	18-20-51.6 70-22-47.9	At the edge of the Escritos plain facing the ocean
<u>3</u>	Concrete	18-20-36 70-22-36	Escritos plain west of the Arica - Tacna railroad
<u>4</u>	Concrete	18-20-10 70-22-12	" " "
<u>5</u>	Concrete	18-19-47 70-21-46	" " "
<u>6</u>	Iron	18-19-27.1 70-21-16.8	" " "
<u>7</u>	Concrete	18-19-10 70-20-46	" " "
<u>8</u>	Concrete	18-18-56 70-20-13	" " "
<u>9</u>	Reinforced Concrete	18-18-50.5 70-19-56.6	Escritos plain 84 meters west of the Arica - Tacna railroad
<u>10</u>	Concrete	18-18-46 70-19-39	Escritos plain east of the Arica - Tacna

---

\* The monuments whose number is underlined are vertexes of the boundary polygon.



			railroad
<u>11</u>	Iron	18-18-38.6 70-19-04.6	Escritos plain near the Arica - Tacna road
<u>12</u>	Concrete	18-18-35 70-18-29	Escritos plain east of the Arica - Tacna road
<u>13</u>	Iron	18-18-35.1 70-17-53.3	Escritos ravine
<u>14</u>	Concrete	18-18-36 70-17-33	Escritos ravine, north bank of the dry river bed
15	Iron	18-18-38.2 70-16-51.0	Marshland, slope of Sur hill, Escritos ravine
16	Iron	18-18-49.6 70-15-43.9	Peak of Sur hill, Escritos ravine
17	Iron	18-18-55.6 70-15-08.8	Sandy plateau between Escritos and Gallinazos ravines
<u>18</u>	Iron	18-19-02.8 70-14-26.7	Peak of Norte hill, Gallinazos ravine
<u>19</u>	Iron	18-19-23.0 70-12-13.7	Hill, Gallinazos ravine, north side
<u>20</u>	Iron	18-19-12.5 70-09-20.2	Edge of hill adjacent to north branch, Gallinazos ravine, now called Concordia
<u>21</u>	Iron	18-18-10 70-07-11	Plateau north of Concordia ravine
<u>22</u>	Iron	18-17-06.7 70-05-03.8	" " "
<u>23</u>	Iron	18-16-14 70-03-22	" " "
24	Iron	18-16-14 70-02-39	Bottom of Concordia ravine
<u>25</u>	Iron	18-16-13.9 69-59-28.8	Hilly plateau, north of Estacion Central, Arica - La Paz Railroad

<u>26</u>	Iron	18-15-46 69-58-21	" " "
<u>27</u>	Stone	18-12-16 69-54-48	Foothills of the Puquios heights northwest of Pampa Ossa station
<u>28</u>	Iron	18-10-15.2 69-51-59.0	Puquios heights
<u>29</u>	Iron	18-07-02.9 69-49-21.0	Puquios heights northwest of the Puquios heights station
<u>30</u>	Iron	18-04-22 69-48-05	Hualillas mountain range
31	Stone	18-02-42 69-47-16	" " "
32	Iron	18-02-20.6 69-47-05.6	Hualillas mountain range
33	Stone	18-01-47 69-46-49	" " "
34	Iron	18-01-06.6 69-46-29.4	Hualillas ravine near the Tacna - Putre road
35	Stone	18-00-37 69-46-15	Hualillas mountain range
36	Iron	17-59-35 69-45-45	" " "
<u>37</u>	Stone	17-59-25 69-45-40	" " "
38	Iron	17-56-54 69-45-24	Hualillas mountain range, at the beginning of the ravines in the direction of Tacna valley
<u>39</u>	Stone	17-56-64 69-45-24	Hualillas mountain range, at the beginning of the ravines in the direction of Tacna

valley

40	Stone	17-56-28 69-45-46	"	"	"
41	Stone	17-55-45 69-46-22	"	"	"
42	Stone	17-55-23 64-46-40	"	"	"
43	Stone	17-54-54 69-47-04	"	"	"
<u>44</u>	Stone	17-54-47 64-47-10	"	"	"
45	Iron	17-54-32 69-47-16	"	"	"
46	Stone	17-53-19 69-47-46	"	"	"
47	Stone	17-52-28 69-48-08	"	"	"
48	Iron	17-52-01 69-48-19	"	"	"
<u>49</u>	Stone	17-52-00 69-45-24	Hualillas mountains, at the beginning of the ravines toward Tacna		
50	Stone	17-51-17 69-48-22	"	"	"
51	Stone	17-50-06 69-48-25	"	"	"
52	Stone	17-49-21 69-48-28	"	"	"
53	Stone	17-48-39 69-48-30	Hualillas Sur hill directly opposite the villa Industrial - Tacna		
<u>54</u>	Iron	17-48-20.3 69-48-34.5	Hualillas hill opposite the Villa Industrial road, near Mauri canal		
<u>55</u>	Iron	17-45-47.5	Left bank of the Rio		

		69-48-25.5	Azufre west of Villa Industrial
<u>56</u>	Iron	17-45-16.4 69,49-07.2	Solitary hill skirted by the Rio Azufre and the Tacna road
<u>57</u>	Iron	17-44-42.3 69-49-43.7	Right bank of the Rio Azufre south of the Uchusuma canal
<u>58</u>	Iron	17-43-36.7 69,49-47.4	Rocky hill, right bank of the Rio Azufre, northern side of Aguas Calientes
<u>59</u>	Iron	17-42-25.4 69-49-56.4	Ataspaca peak, slope of Chipiquina hill and north of the Tacora sulphur railroad
60	Stone	17-41-40 69-49-34	Southwestern slope of the snow-covered hill, Chipiquina
<u>61</u>	Peak	17-58-50.9 69-48-10.1	Peak of the snow-covered hill El Fraile
62	Stone	17-38-53.5 69-47-29.5	Eastern slope of El Fraile toward the Chislluma ravine
63	Iron	17-38-56 69-46-43	Chislluma ravine, near the path leading to Tarata
64	Stone	17-39-00 69-46-01	Western slope, cluster of hills between Quinuta to the north And Calzon Chiatto to the south
65	Stone	17-39-07 69-44-52	Western slope, cluster of hills between Quinuta to the north And Calzon Chiatto to the south
<u>66</u>	Peak	17-39-12.1 69-44-16.5	Central low peak among the above-mentioned peaks
67	Iron	17-39-25.1 69-42-30.8	Eastern slope of the above-mentioned

			cluster of hills
68	Iron	17-39-32.4 69-41-30.3	Laguna Blanca plateau, 800 meters east of Uchusuma canal
<u>69</u>	Iron	17-39-40.8 69-40-21.7	Southwestern point of Laguna Blanca
<u>70</u>	Iron	17-37-24.8 69-37-31.9	Northeastern point of Laguna Blanca
71	Stone	17-37-17.6 69-37-21.7	Southwestern slope of Pacocagua hill
72	Iron	17-36-31.7 69-36-17.7	" " "
73	Stone	17-35-32.9 69-34-53.5	Southeastern slope of Pacocagua hill
<u>74</u>	Stone	17-35-17.5 69-34-31.7	" " "
<u>75</u>	Iron	17-34-34.8 69-33-31.0	A short distance south of the village of Ancomarca
<u>76</u>	Iron	17-32-55 69-31-41	Plateau in the Ancomarca region
<u>77</u>	Stone	17-32-20 69-31-05	" " "
<u>78</u>	Iron	17-31-39 69-30-19	" " "
79	Stone	17-30-45 69-29-21	" " "
<u>80</u>	Iron	17-29-57.0 69-28-28.8	Final common point of the boundaries between Peru, Chile, and Bolivia. Marker No. 5 of the old boundary line between Chile and Bolivia.

They also wish to attest that the markers whose numbers are underlined are vertexes of the boundary polygon; that the geographic positions indicated to one-tenth of a second refer to the markers whose geographic position has been determined with a margin of error of not more than two meters; in the others, the accuracy is within 15 meters, except for markers

23, 24, and 30, for which the margin of error is 60 meters; and that the iron markers have been made of angular and flat members, riveted together to form quadrangular pyramids five meters high. On the upper part a cast-iron plaque is affixed, bearing the words "Chile and Peru" on its two sides. The concrete markers are quadrangular blocks one meter and 20 centimeters high. The stone markers are monuments composed of stones superimposed on each other and are approximately one meter thick and one and one-half meters high. The Concordia marker is a reinforced concrete monument six meters high. Markers have not been placed at two places, but these are marked by prominent peaks that are hard to reach.

In witness whereof, they sign and seal this Act, in duplicate, in Lima, on August 5, 1930.

(L.S.) Pedro M. Oliveira

(L.S.) Conrado Ríos Gallando

## II. Documents

1. Treaty of Territorial Limits between Chile and Bolivia, Santiago, August 10, 1866. British and Foreign State Papers (BFSP), Vol. 56, 1865 - 66, pp. 717 - 719.
2. Decree of the President of Chile, promulgating the Convention concluded with Bolivia, on the 5th of December, 1872, relating to Boundaries and Neutral Territory. Santiago, January 8, 1873. Ibid., Vol. 65, 1873 - 74, pp. 275 - 277.
3. Treaty between Bolivia and Chile, respecting boundaries. Sucre, August 6, 1874. Ibid., Vol. 71, 1879 - 1880, pp. 897 - 899.
4. Treaty of Peace and Friendship between Chile and Peru. Lima, October 20, 1883 [Ratifications exchanged at Lima, March 28, 1884]. Ibid., Vol. 74, 1882 - 83, pp. 349 - 352.
5. Agreement of Truce between Chile and Bolivia. Valparaiso, April 4, 1884 [Ratifications exchanged November 29, 1884]. Ibid., Vol. 75, 1883 - 84, pp. 367 - 370 (includes Supplementary Protocol, April 8, 1884).
6. Treaty of Peace and Amity between the Republics of Chile and Bolivia. Santiago, May 18, 1895 [Ratifications exchanged at Santiago, April 30, 1896]. Ibid., Vol. 88, 1895 - 96, pp. 755 - 757.
7. Treaty of Peace, Friendship, and Commerce between Bolivia and Chile. Santiago, October 20, 1904 [Ratifications exchanged at La Paz, March 10, 1905]. Ibid., Vol. 98, 1904 - 05, pp. 763 - 770.
8. Protocol of Arbitration between Chile and Peru, with Supplementary Act. Washington, July 20, 1922. League of Nations Treaty Series, Vol. 21, 1923 - 24, No. 537, pp. 142 - 146.
9. In the matter of the Arbitration between the Republic of Chile and the Republic of Peru, with respect to the unfulfilled Provisions of the Treaty of Peace of October 20, 1883, under the Protocol and Supplementary Act signed at Washington July 20, 1922. The American Journal of International Law, Vol. 19, 1925, pp. 393 - 432.
10. Treaty for the Settlement of the Dispute regarding Tacna and Arica, with additional Protocol. League of Nations, op. cit., Vol. 94, 1929, No. 2157, pp. 402 - 411.
11. Acta Final sobre la Demarcacion de la Frontera. Lima, 1930. Tratados, Convenciones y Acuerdos vigentes entre el Peru y otros Estados, Lima, 1936, pp. 191 - 197.
12. Ireland, Gordan, Boundaries, Possessions and Conflicts in South America.

Cambridge, Massachusetts: Harvard University Press, 1938; Disputes and Adjustments: Chile - Peru pp. 160 - 175, Bolivia - Chile pp. 53 - 66; Existing Treaty Relations: Chile - Peru pp. 294 - 5, Bolivia - Chile pp. 284 - 5.

13. Marchant, Alexander, Boundaries of the Latin American Republics. Washington: United States Government Printing Office, 1944; Bolivia - Chile pp. 244 - 47, Chile - Peru pp. 279 - 80.

### **III. Maps**

1. Chile: scale 1:250,000; published 1954 by Instituto Geografico Militar de Chile; Carta Preliminar, sheets: 1870 (Arica), 1770 (General Lagos), and 1769 (Cosapilla).

2. Peru: Scale 1:100,000; published 1961 - 62 by Instituto Geografico Militar de Peru; sheets: 37-v (Tacna), 37-x (Huailillas), 36-x (Palca), and 35-y (Antajave).



This International Boundary Study is one of a series of specific boundary papers prepared by the Geographer, Office of Research in Economics and Science, Bureau of Intelligence and Research, Department of State, in accordance with provisions of Bureau of the Budget circular No. A-16.

Government agencies may obtain additional information and copies of the study by calling the Geographer, Room 8744, Department of State, Washington 25, D.C. (Telephone: Code 182, Extension 4508).