



Department of State.

**CERTIFICATE OF AUTHORITY
OF**

REPUBLIC GEOTHERMAL, INC.

I, PETE T. CENARRUSA, Secretary of State of the State of Idaho, hereby certify that duplicate originals of an Application of _____

REPUBLIC GEOTHERMAL, INC.

_____ for a Certificate of Authority to transact business in this State, duly signed and verified pursuant to the provisions of the Idaho Business Corporation Act, have been received in this office and are found to conform to law.

ACCORDINGLY and by virtue of the authority vested in me by law, I issue this Certificate of Authority to _____

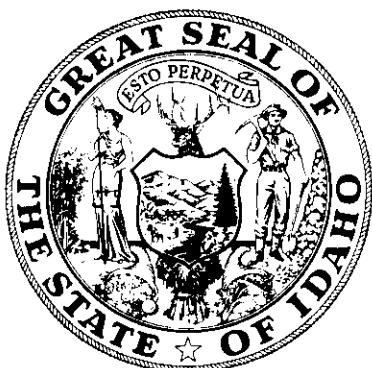
REPUBLIC GEOTHERMAL, INC.

to transact business in this State under the name _____

REPUBLIC GEOTHERMAL, INC.

_____ and attach hereto a duplicate original of the Application for such Certificate.

Dated _____ October 12, 19 79.



Pete T. Cenarrusa

SECRETARY OF STATE

Corporation Clerk

APPLICATION FOR CERTIFICATE OF AUTHORITY

To the Secretary of State of Idaho.

Pursuant to Section 30-1-110, **Idaho Code**, the undersigned Corporation hereby applies for a Certificate of Authority to transact business in your State, and for that purpose submits the following statement:

1. The name of the corporation is REPUBLIC GEOTHERMAL, INC.
2. *The name which it shall use in Idaho is REPUBLIC GEOTHERMAL, INC.
3. It is incorporated under the laws of California
4. The date of its incorporation is July 11, 1974 and the period of its duration is perpetual
5. The address of its principal office in the state or country under the laws of which it is incorporated is 11823 East Slauson Ave., Suite One, Santa Fe Springs, CA 90670
6. The address of its proposed registered office in Idaho is 300 North 6th Street
Boise, Idaho 83701, and the name of its proposed registered agent in Idaho at that address is C T CORPORATION SYSTEM
7. The purpose or purposes which it proposes to pursue in the transaction of business in Idaho are:
Exploration for, development of, and production and sale of,
geothermal resources for commercial applications.
8. The names and respective addresses of its directors and officers are:

Name	Office	Address
<u>Robert W. Rex</u>	<u>President</u>	<u>11823 E.Slauson Ave., Suite One</u> <u>Santa Fe Springs, CA 90670</u>
<u>Thomas J. Reilly</u>	<u>Secretary</u>	<u>11823 E.Slauson Ave., Suite One</u> <u>Santa Fe Springs, CA 90670</u>

See attached list.

9. The aggregate number of shares which it has authority to issue, itemized by classes, par value of shares, and shares without par value, is:

Number of Shares	Class	Par Value Per Share or Statement That Shares Are Without Par Value
<u>2,000,000</u>	<u>Common</u>	<u>No par</u>
<u> </u>	<u> </u>	<u> </u>
<u> </u>	<u> </u>	<u> </u>

(continued on reverse)

10. The aggregate number of its issued shares, itemized by classes, par value of shares, and shares without par value, is:

Number of Shares	Class	Par Value Per Share or Statement That Shares Are Without Par Value
915,525	Common	No par

11. The corporation accepts and shall comply with the provisions of the Constitution and the laws of the State of Idaho.

12. This Application is accompanied by a copy of its articles of incorporation and amendments thereto, duly authenticated by the proper officer of the state or country under the laws of which it is incorporated.

Dated September 19, 19 79

REPUBLIC GEOTHERMAL, INC.

By David J. Howell
Its Vice President

and Thomas J. Rilly
Its Secretary

STATE OF CALIFORNIA)
) ss:
COUNTY OF LOS ANGELES)

I, Catherine O. Barone, a notary public, do hereby certify that on this 19th day of September, 19 79, personally appeared before me David J. Howell, who being by me first duly sworn, declared that he is the Vice President of REPUBLIC GEOTHERMAL, INC.

that he signed the foregoing document as Vice President of the corporation and that the statements therein contained are true.

Catherine O. Barone
Notary Public

*Pursuant to section 30-1-108(b)(1), Idaho Code, if the corporation assumes a name other than its true name, this application must be accompanied by a resolution of the Board of Directors to that effect.



DIRECTORS AND OFFICERS OF REPUBLIC GEOTHERMAL, INC.

<u>Name and Address</u>	<u>Title</u>
Robert W. Rex 11823 E. Slauson Ave., Ste One Santa Fe Springs, CA 90670	President & Director
Edgar W. Wellbaum 11823 E. Slauson Ave., Ste One Santa Fe Springs, CA 90670	Executive Vice President & Director
David J. Howell 11823 E. Slauson Ave., Ste One Santa Fe Springs, CA 90670	Vice President-Treasurer & Director
Mr. Sanford Kaplan 10433 Wilshire Boulevard Los Angeles, California 90024	Director
Mr. C. Richard Kramlich Arthur Rock & Co. 1635 Russ Building 235 Montgomery Street San Francisco, California 94104	Director
Mr. Arthur Rock Arthur Rock & Co. 1635 Russ Building 235 Montgomery Street San Francisco, California 94104	Director
The Hon. Anthony T.S. Montagu Chairman of the Board Abingworth Limited 26 St. James's Street London SW1A 1HA England	Director
Mr. Earl C. Rose, Jr. 10 South Brentwood Boulevard Clayton, Missouri 63105	Director
Mr. Norman Burnam 3030 South Bundy Drive Los Angeles, California 90066	Director
Mr. John K. O'Connor Lord, Bissell & Brook 115 South LaSalle Street Room 3500 Chicago, Illinois 60603	Director

Name and AddressTitle

Donald A. Campbell
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Vice President-Engineering & Technology

Thomas L. Cook
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Vice President-Operations

Timothy M. Evans
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Vice President-Land

John L. Smith
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Vice President-Exploration

Lenny M. Targon
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Vice President-Controller

Thomas J. Reilly
11823 E. Slauson Ave., Ste One
Santa Fe Springs, CA 90670

Secretary & General Counsel

State of California

OFFICE OF THE SECRETARY OF STATE

Reproduction
Certification

I, *MARCH FONG EU*, Secretary of State of the State of California, hereby certify:

That the annexed transcript was prepared by and in this office from the record on file, of which it purports to be a copy, and that it is full, true and correct.

IN WITNESS WHEREOF, I execute
this certificate and affix the Great
Seal of the State of California this

MAY 21 1979



March Fong Eu

Secretary of State

708330

FILED

In the office of the Secretary of State
of the State of New York

ARTICLES OF INCORPORATION

JUL 11 1974

OF

REPUBLIC ENERGY, INC.

EDWARD J. BRENNAN, Secretary of State

By Deputy

I

The name of this corporation shall be
REPUBLIC ENERGY, INC.

II

The purposes for which this corporation is formed
are:

- (a) To engage primarily in the specific business
of exploration for, exploitation of, and processing and
marketing energy related natural resources.
- (b) To engage generally in the business of exploration
for, exploitation of, and processing and marketing natural
resources of any nature.
- (c) To engage in any business related or unrelated
to those described in Paragraphs (a) and (b) of this
Article II and from time to time authorized or approved
by the board of directors of this corporation;
- (d) To do business anywhere in the world;
- (e) To exercise any and all rights and powers now
and hereafter granted to a corporation by law; and

(5) To act as principal, agent, partner, joint venturer or in any other legal capacity in any transaction.

The above purpose clauses shall not be limited by reference to or inference from one another, but each such purpose clause shall be construed as a separate statement conferring independent purposes and powers upon the corporation.

III

The county in the State of California where the principal office for the transaction of business of this corporation is located is Los Angeles County.

IV

(a) The number of directors of this corporation shall be three (3).

(b) The names and addresses of the persons who are appointed to act as the first directors of this corporation are:

<u>NAME</u>	<u>ADDRESS</u>
Thomas J. Reilly	One Wilshire Boulevard Los Angeles, CA 90017
Maureen Rosset	One Wilshire Boulevard Los Angeles, CA 90017
Andrea Benigar	One Wilshire Boulevard Los Angeles, CA 90017

V

The total number of shares which this corporation shall have authority to issue is 750,000 shares, all of one class. The aggregate par value of all of said shares is Seventy-Five Thousand Dollars (\$75,000), and the par value of each such share is Ten Cents (\$0.10).

IN WITNESS WHEREOF, the undersigned, being the persons hereinabove named as the first directors of this corporation, have executed these Articles of Incorporation, this 11th day of July, 1974.

Thomas J. Reilly
THOMAS J. REILLY, Incorporator

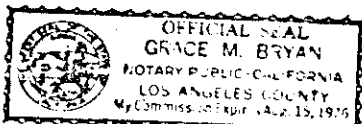
Maureen Rosset
MAUREEN ROSSET, Incorporator

Andrea Benigar
ANDREA BENIGAR, Incorporator

STATE OF CALIFORNIA)
) ss.
COUNTY OF LOS ANGELES)

On this 11th day of July, 1974, before me, a Notary Public for the State of California, personally appeared THOMAS J. REILLY, MAUREEN ROSSET and ANDREA BENIGAR, known to me to be the persons whose names are subscribed to the within Articles of Incorporation, and acknowledged to me that they executed the same.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed my official seal on the day and year first above written.



One Wilshire Bl., Suite 2030, Los Angeles, CA 90017

Grace M. Bryan
Notary Public

MA CHAINED TO: REPUBLIC CYTHERMAL, INC.

1151703

70.8330 SURV

PLAN AND AGREEMENT

MERGE

FILED

In the office of the Secretary of State
of the State of Nevada

SEP 20 1977

MAKING THE SECRETARY OF STATE

[Signature]
Secretary

THIS PLAN AND AGREEMENT OF MERGE, dated as of September 20, 1977, by and between REPUBLIC CYTHERMAL, INC., a Nevada corporation ("Republic Nevada") and REPUBLIC ENERGY, INC., a California corporation ("Republic California"), said corporations being sometimes hereinafter referred to as the "Constituent Corporations";

WITNESSETH:

WHEREAS, Republic Nevada is a corporation duly organized and existing under the laws of the State of Nevada, having been incorporated on August 15, 1973, and Republic California is a corporation duly organized and existing under the laws of the State of California, having been incorporated on July 11, 1974; and

WHEREAS, the Boards of Directors of Republic Nevada and Republic California deem it advisable and for the mutual benefit of said corporations and their shareholders that Republic Nevada merge with and into Republic California pursuant to applicable laws of the States of Nevada and California on the terms hereinafter set forth; and

WHEREAS, the authorized stock of Republic Nevada consists of 1,000,000 shares of capital stock, par value \$0.10, of which, at June 30, 1977, 832,650 shares were issued and outstanding and entitled to one vote per share, and of which an additional 84,500 unissued shares were reserved for possible issuance under Republic Nevada's Qualified and Non-Qualified Stock Option Plans, and pursuant to an option granted to a Director of Republic Nevada; and

WHEREAS, the authorized stock of Republic California consists of 750,000 shares of capital stock of which, at June 30, 1977, 1,000 shares were issued and outstanding and entitled to one vote per share; and

WHEREAS, the Boards of Directors of Republic Nevada and of Republic California have adopted resolutions declaring

advisable the proposed merger (hereinafter referred to as the "Merger") of Republic Nevada into Republic California upon the terms and conditions hereinafter set forth and approving this Plan and Agreement of Merger, and the Boards of Directors of Republic Nevada and Republic California have directed that this Plan and Agreement of Merger be submitted to their respective shareholders at separate meetings called for the purpose of taking the same under consideration, in accordance with the applicable statutes of the States of Nevada and California; and

WHEREAS, the Merger provided for herein is intended to be a "reorganization" as defined in Section 368(a) of the Internal Revenue Code; and

WHEREAS, the Merger provided for herein is intended to be accounted for as a "combination of companies under common control";

NOW, THEREFORE, in consideration of the premises and the mutual covenants and agreements herein contained, and for the purpose of prescribing the terms and conditions of the Merger, the mode of carrying the same into effect, the manner and basis of converting or exchanging the shares of Republic Nevada into or for shares of Republic California, and such other details and provisions as are deemed necessary or desirable, the parties hereto have agreed, and do hereby agree, subject to the terms and conditions hereinafter set forth, as follows:

ARTICLE ONE

Merger of Republic Nevada and Continued Existence of Republic California

1. On the effective date of the Merger (the "Effective Date"), Republic Nevada shall be merged into Republic California in accord with and in the manner provided in Section 79.480 of the Nevada Revised Statutes and Section 1109 of the Corporations Code of the State of California (which transaction is hereinafter referred to as the "Merger"), and thereafter the corporate identity, existence, purposes, properties, powers, privileges, franchises, rights and immunities of Republic Nevada shall be fully vested in Republic California.

2. On the Effective Date, the separate existence of Republic Nevada shall cease, except as provided by statute, and Republic Nevada and Republic California shall become a single corporation (hereinafter sometimes referred to as the "Surviving

Corporation"). The Surviving Corporation shall be Republic California, one of the parties hereto, which shall assume the name Republic Geothermal, Inc. and be governed by the laws of the State of California, with its identity, existence, purposes, powers, privileges, franchises, rights and immunities continuing unaffected and unimpaired by the Merger.

3. On the Effective Date, all and singular rights, privileges, powers and franchises, of a public as well as a private nature, and all the property, real, personal and mixed of Republic Nevada and all debts due to it on whatever account, and all other things in action or belonging to it shall be taken and deemed to be transferred to, and shall be vested in, the Surviving Corporation without further act or deed; and all property, rights, privileges, powers and franchises and all and every other interest shall be thereafter as effectually the property of the Surviving Corporation as they were of Republic Nevada and the title to any real estate, whether vested by deed or otherwise in Republic California shall not revert or be in any way impaired by reason of the Merger; but the Surviving Corporation shall thenceforth be liable for all debts, liabilities, obligations, duties and penalties of Republic Nevada and all said debts, liabilities, obligations, duties and penalties shall thenceforth attach to the Surviving Corporation and may be enforced against it to the same extent as if said debts, liabilities, obligations, duties and penalties had been incurred or contracted by it. No liability or obligation due at the Effective Date, or then to become due, claim or demand for any cause then existing against Republic Nevada, or any shareholders, officer or Director thereof, shall be released or impaired by the Merger, and all rights of creditors and all liens upon property of Republic Nevada shall be preserved unimpaired.

4. (a) Article I of the Articles of Incorporation of Republic California shall be amended to read in full as follows:

"I

The name of the corporation shall be

.'Republic Geothermal, Inc.'"

(b) Article V of the Articles of Incorporation of Republic California shall be amended to read in full as follows:

"V

The total number of shares which this

corporation shall have authority to issue up to 1,000,000, all of one class, which shall be without par value.

5. The By-laws of Republic Nevada, as in effect on the Effective Date, shall become the By-laws of the Surviving Corporation to the extent that they are consistent with the Articles of Incorporation of the Surviving Corporation and with the laws of the State of California and shall continue in effect until thereafter altered, amended or repealed in accordance with law or with the Articles of Incorporation of the Surviving Corporation.

6. On or before the Effective Date, all persons holding positions as Directors and/or officers of Republic Nevada shall be elected to and thereafter hold corresponding positions as Directors and/or officers of Republic California.

ARTICLE TWO

Manner and Basis of Converting Shares of Republic Nevada into Shares of the Surviving Corporation

The mode of carrying into effect the Merger and the manner and basis of converting shares of Republic Nevada into shares of Republic California shall be as follows:

1. Forthwith upon the Effective Date the shares of common stock of Republic California which shall be outstanding immediately prior to the Effective Date, consisting of 1,000 shares of capital stock, shall be cancelled and retired, and no shares of capital stock or other securities of the Surviving Corporation shall be issuable with respect thereto.

2. Each share of Republic Nevada capital stock outstanding on the Effective Date and all rights in respect thereof shall, without any action on the part of the holder thereof, be converted into one fully paid and non-assessable share of capital stock of Republic California.

3. Forthwith upon the Effective Date each certificate nominally representing shares of the capital stock of Republic Nevada shall be deemed for all corporate purposes to evidence the ownership of an equal number of shares of capital stock of Republic California and the holders of such certificates will not be required immediately to surrender such certificates in exchange for certificates of capital stock of Republic California. As certificates nominally representing capital stock of Republic Nevada are surrendered for transfer, however, Republic California will cause to be issued certificates representing capital stock of Republic California and, at any time upon surrender by any holder of certificates nominally representing shares of capital stock of Republic Nevada, Republic California will cause to be issued therefor certificates for an equal number of shares of capital stock of Republic Nevada.

ARTICLE THREE

Options

1. Upon the Effective Date, the Surviving Corporation shall have as stock option plans the stock option plans of Republic Nevada. From and after the Effective Date, the references in the stock option plans (i) to "Company" shall be to the Surviving Corporation, (ii) to the "Board of Directors" shall be to the Board of Directors of the Surviving Corporation, and (iii) to the "Compensation Committee" shall be to the Compensation Committee of the Surviving Corporation.

2. Each option which has been granted under Republic Nevada's stock option plans and which shall be in effect immediately prior to the Effective Date shall continue in effect upon the Merger becoming effective, subject to the provisions of the Plan under which it was issued, except that such option shall, upon the Merger becoming effective, cover one share of the capital stock of Republic California for each share of the capital stock of Republic Nevada covered by such option immediately prior to the Effective Date.

ARTICLE FOUR

Termination

This Plan and Agreement of Merger shall be submitted

to the stockholders of each of the Constituent Corporations, at a meeting of the stockholders of each such corporation, and, if adopted by the vote of the stockholders of each of the Constituent Corporations required by statute, shall be made effective thereafter in the manner provided in ARTICLE FIVE hereof. If this Plan and Agreement of Merger is not so adopted by the stockholders of both the Constituent Corporations, it shall thereupon terminate. Notwithstanding the adoption of this Plan and Agreement of Merger by the stockholders of both of the Constituent Corporations, it may nevertheless be terminated at any time prior to the effective date by mutual consent of the Constituent Corporations, expressed by action of their respective Boards of Directors.

ARTICLE FIVE

Effective Date

After the adoption of this Plan and Agreement of Merger by the shareholders of Republic Nevada and Republic California, in accordance with the requirements of applicable law, provided that the Plan and Agreement of Merger shall not have been terminated as hereinabove provided, and at such time as shall be mutually agreed upon in writing by Republic Nevada and Republic California, a copy of this Plan and Agreement of Merger shall be filed with the Secretary of State of the State of California, and an executed counterpart thereof shall be filed in the Office of the Secretary of State of the State of Nevada. The date and time of the latter of such filings is referred to in this Agreement as the "Effective Date".

ARTICLE SIX

General

1. From time to time, as and when requested by the Surviving Corporation, or by its successors or assigns, Republic Nevada shall execute and deliver or cause to be executed and delivered all such deeds and other instruments, and shall take or cause to be taken all such further or other action, as the Surviving Corporation, or its successors or assigns, may deem necessary or desirable in order to vest in and confirm to the Surviving Corporation, and its successors and assigns, title to and possession of all the property,

rights, privileges, powers and franchises referred to in ARTICLE TWO hereof and otherwise to carry out the intent and purposes of this Plan and Agreement of Merger.

2. This Plan and Agreement of Merger and the legal regulations between the parties hereto shall be governed by and construed in accordance with the laws of the State of California except insofar as the internal law of the State of Nevada shall mandatorily apply to the Merger.

IN WITNESS WHEREOF, each of the Constituent Corporations has caused this Plan and Agreement of Merger to be signed in its corporate name by its Chief Executive Officer and its Secretary or one of its Assistant Secretaries and its corporate seal to be affixed hereto, all as of the date first above written.

REPUBLIC GEOTHERMAL, INC.,
a Nevada corporation

By *Robert W. Rex*
Robert W. Rex, President
and Chief Executive Officer

By *Thomas J. Reilly*
Thomas J. Reilly, Secretary

REPUBLIC ENERGY, INC.,
a California corporation

By *Robert W. Rex*
Robert W. Rex, President
and Chief Executive Officer

By *Thomas J. Reilly*
Thomas J. Reilly, Secretary

OFFICERS' CERTIFICATE
OF
REPUBLIC ENERGY, INC.

We, ROBERT W. REX, President, and THOMAS J. REILLY,
Secretary, of REPUBLIC ENERGY, INC., a corporation duly organized
and existing under the laws of the State of California, do hereby
certify:

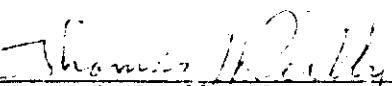
1. That they are the President and the Secretary,
respectively of REPUBLIC ENERGY, INC., a California corporation.
2. The total number of outstanding shares of each
class of this corporation entitled to vote on the merger is as
follows:

<u>Class</u>	<u>Total number of shares entitled to vote</u>
\$0.10 par value capital stock	1,000

3. That the agreement of merger in the form attached
was approved by the written consent of the sole shareholder of
this corporation, Republic Geothermal, Inc., a Nevada corporation.

IN WITNESS WHEREOF, we have executed this certificate
this 9th day of September 1977.


Robert W. Rex, President


Thomas J. Reilly, Secretary

Each of the undersigned declares under penalty of perjury that the statements contained in the foregoing certificate are true of their own knowledge. Executed at Los Angeles, California, on September 9, 1977.

Robert W. Rex
Robert W. Rex, President

Thomas J. Reilly
Thomas J. Reilly, Secretary

OFFICERS' CERTIFICATE

OF

REPUBLIC GEOTHERMAL, INC.

ROBERT W. REX, President, and THOMAS J. RILLY, Secretary, of REPUBLIC GEOTHERMAL, INC., a corporation duly organized and existing under the laws of the State of Nevada, do hereby certify:

1. That they are the President and the Secretary, respectively of REPUBLIC GEOTHERMAL, INC., a corporation.

2. The total number of outstanding shares of each class of this corporation entitled to vote on the merger is as follows:

<u>Class</u>	<u>Total number of shares entitled to vote</u>
\$0.10 par value capital stock	832,650

3. That the agreement of merger in the form attached was approved by the shareholders of this corporation by a vote of the number of shares of each class which equalled or exceeded the vote required by each class to approve said agreement of merger.

4. That each class entitled to vote and the minimum percentage vote of each such class is as follows:

<u>Class</u>	<u>Minimum percentage vote required to approve the merger</u>
\$0.10 par value capital stock	More than 50 percent

IN WITNESS WHEREOF, we have executed this certificate
this 9th day of September, 1977.

Robert W. Rex
Robert W. Rex, President

Thomas J. Reilly
Thomas J. Reilly, Secretary

Each of the undersigned declares under penalty of perjury that the statements contained in the foregoing certificate are true of their own knowledge. Executed at Los Angeles California, on September 9, 1977.

Robert W. Rex
Robert W. Rex, President

Thomas J. Reilly
Thomas J. Reilly, Secretary

708330

A189209

RESTATED ARTICLES OF INCORPORATION
OF
REPUBLIC GEOTHERMAL, INC.

FILED
In the office of the Secretary of State
of the State of California

APR 14 1978

MADEIRA E. Secretary of State
Deputy

Robert W. Rex and Thomas J. Reilly certify that:

1. They are the duly elected and acting President and Secretary, respectively, of said corporation.
2. The Articles of Incorporation of said corporation shall be amended and restated to read in full as follows:

I.

The name of this corporation shall be REPUBLIC GEOTHERMAL, INC.

II.

The purpose of this corporation is to engage in any lawful act or activity for which a corporation may be organized under the General Corporations Law of California other than the banking business, the trust company business, or the practice of a profession permitted to be incorporated by the California Corporations Code.

III.

This corporation is authorized to issue only one class of shares, and the total number of such shares which this corporation is authorized to issue is one million (1,000,000).


IV.

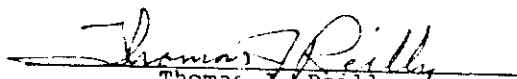
Said corporation elects to be governed by all of the provisions of Division 1 of Title 1 of the California Corporations Code (the "Code"), as amended by act of the California Legislature, 1975-1976 regular session, effective January 1, 1977, as defined in Section 2300 of the California General Corporations Law, not otherwise applicable to this corporation under Chapter 23 of said Division 1."

3. The foregoing amendment has been approved by the Board of Directors of said corporation.

4. The foregoing amendment was one which may be adopted with approval by the Board of Directors alone because the amendment is one which (i) conforms the statement of purposes and powers to subdivision (b) of Section 202 of the Code, (ii) deletes references to par value and location of principal office and (iii) deletes any statement regarding the number of directors, all of which may be done pursuant to Section 2302 of the Code without shareholder approval.

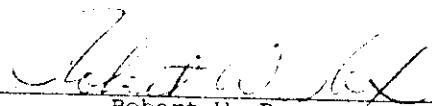
IN WITNESS WHEREOF, the undersigned have executed this Certificate on January 25, 1978.

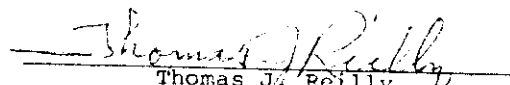

Robert W. Rex


Thomas J. Reilly

The undersigned, Robert W. Rex and Thomas J. Reilly,
the President and Secretary, respectively, of Republic Geotherma
Inc., each declares under penalty of perjury that the matters
set out in the foregoing Certificate are true of his own
knowledge.

Executed at Santa Fe Springs, California on
January 25, 1978.


Robert W. Rex


Thomas J. Reilly

709330

197891

FILED

In the office of the Secretary of State
of the State of California

CERTIFICATE OF AMENDMENT

OF

ARTICLES OF INCORPORATION

DEC 14 1978

JAMES E. HANIS, Secretary of State

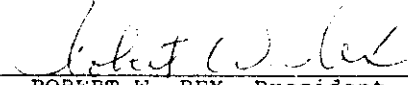
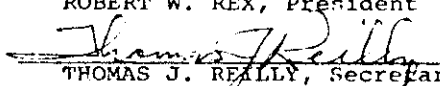
Deputy

ROBERT W. REX AND THOMAS J. REILLY certify that:

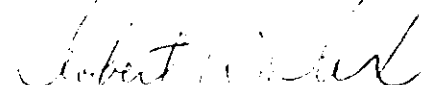
1. They are the President and the Secretary, respectively, of REPUBLIC GEOTHERMAL, INC., a California corporation.
2. Article III of the Articles of Incorporation of this corporation is amended to read as follows:

"This corporation is authorized to issue only one class of shares, and the total number of such shares which this corporation is authorized to issue is two million (2,000,000)."

3. The foregoing amendment of Articles of Incorporation has been duly approved by the Board of Directors.
4. The foregoing amendment of Articles of Incorporation has been duly approved by the required vote of shareholders in accordance with Section 902 of the Corporations Code. The total number of outstanding shares of the corporation is 837,900. The number of shares voting in favor of the amendment equaled or exceeded the vote required. The percentage vote required was more than 50%.


ROBERT W. REX, President
THOMAS J. REILLY, Secretary

The undersigned declare under penalty of perjury that the matters set forth in the foregoing certificate are true of their own knowledge. Executed at Santa Fe Springs, California on December 7, 1978.


ROBERT W. REX
THOMAS J. REILLY