



BALNEOLOGY ASSOCIATION *of* NORTH AMERICA

Research

Information

Education

Community



BANA Mission and Initiatives

Research for natural mineral water communities to deepen an understanding of the health and wellness potential of their waters.

Information and guidance to establish cultural Best Practices for sustaining and promoting health and wellness benefits in your mineral waters.

Establishing the Balneology Best Practices:
Hospitality - Hygiene - Hydration - Harmony -
Homeostasis - Healing - History - Humanity

Educational programs for water stewards, wellness seekers, health practitioners, investors and scientists that serve and benefit from the responsible use of natural mineral waters for wellness and healing.



Balneology is the study of therapeutic bathing and medicinal springs.

BANA applies the science of Balneology to encompass site-specific analysis and classifications of natural mineral water sources including their local and regional geography and geology, mineralogy and chemistry, bio-molecular nature and structural forms, climates and seasons.

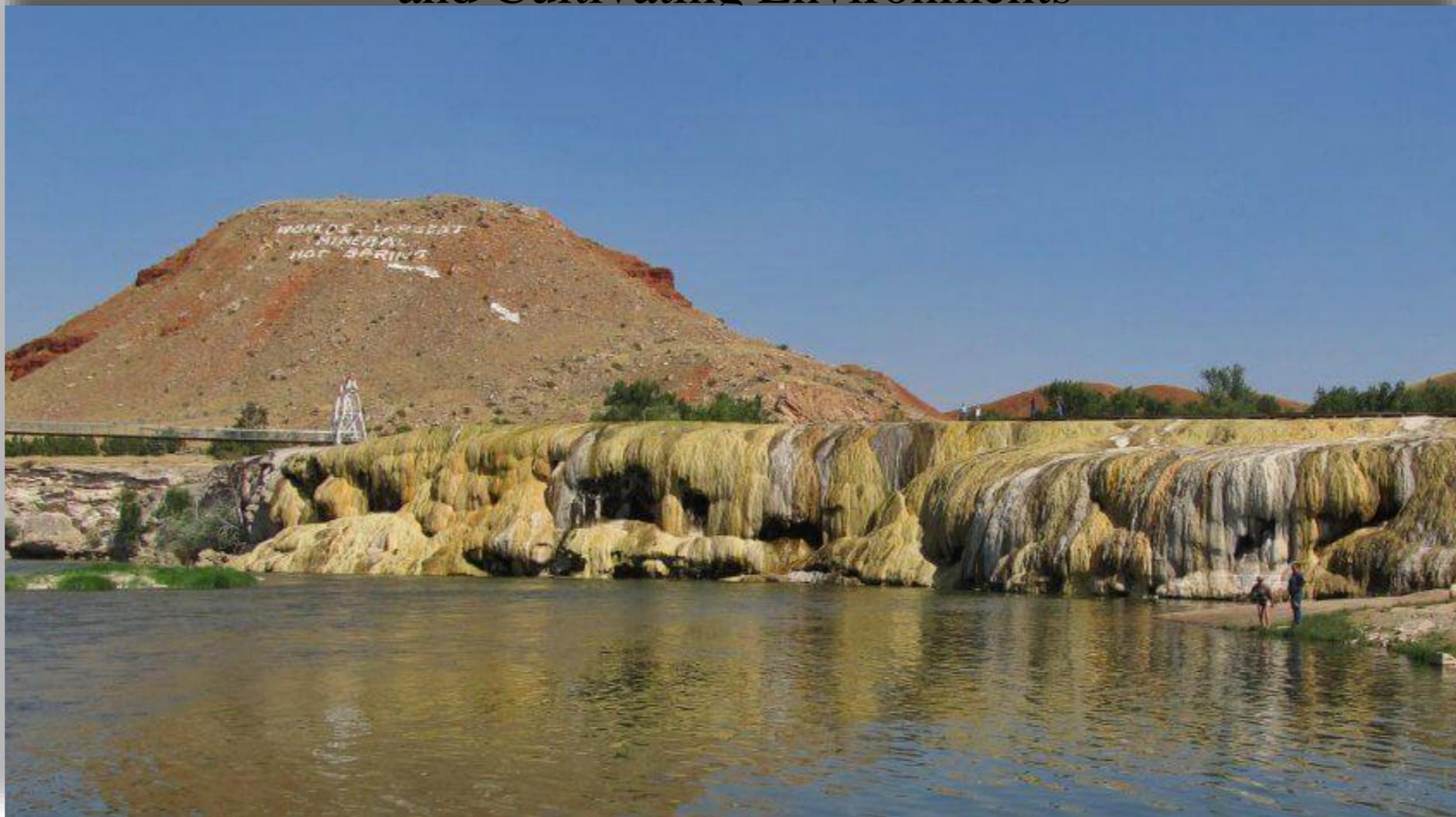
The Medicine of water is the culmination of these factors.



Post-Pandemic Balneology

Using Balneology and Site-Specific-Source Identity can create
Immunity Enhancing Programs through:

Understanding Water Quality
Utilizing Climate
and Cultivating Environments



The BANA TRIQUETRA

Our tool for creating Site-Specific-Source Identity

Embodies Natural Mineral Waters - Referencing, Study, and Practice for Health/Well-Being/Homeostasis



Integrated Fields and Systems of the BANA X DOMAINS

Waters-Foods-Movement-Bodywork-Mind/Body-Natural Therapeutic Agents-Nature-Education-
Management-TIME

Health and Wellness BEST PRACTICES

Hospitality- Hygiene- Hydration- Harmony- Homeostasis- Healing- History- Humanity

FLOW FORMULA

Tool for Holistic Assessment

Stewardship/Environment - Wellbeing/Hygiene - Wellness/Health - Therapeutic/Clinical

Health Promotion - Active Management - Restoration/Recreation

Resources/Plumbing - Relationships/Politics - Renewal/Percentages

Research - Information - Education - Community

The Ancient Waters

The waters are:

Time, ancient time in the making, forced to the surface under pressure with artesian flow.

Also accessed by man through well drilling to come to the surface with artesian pressure or via pumping.

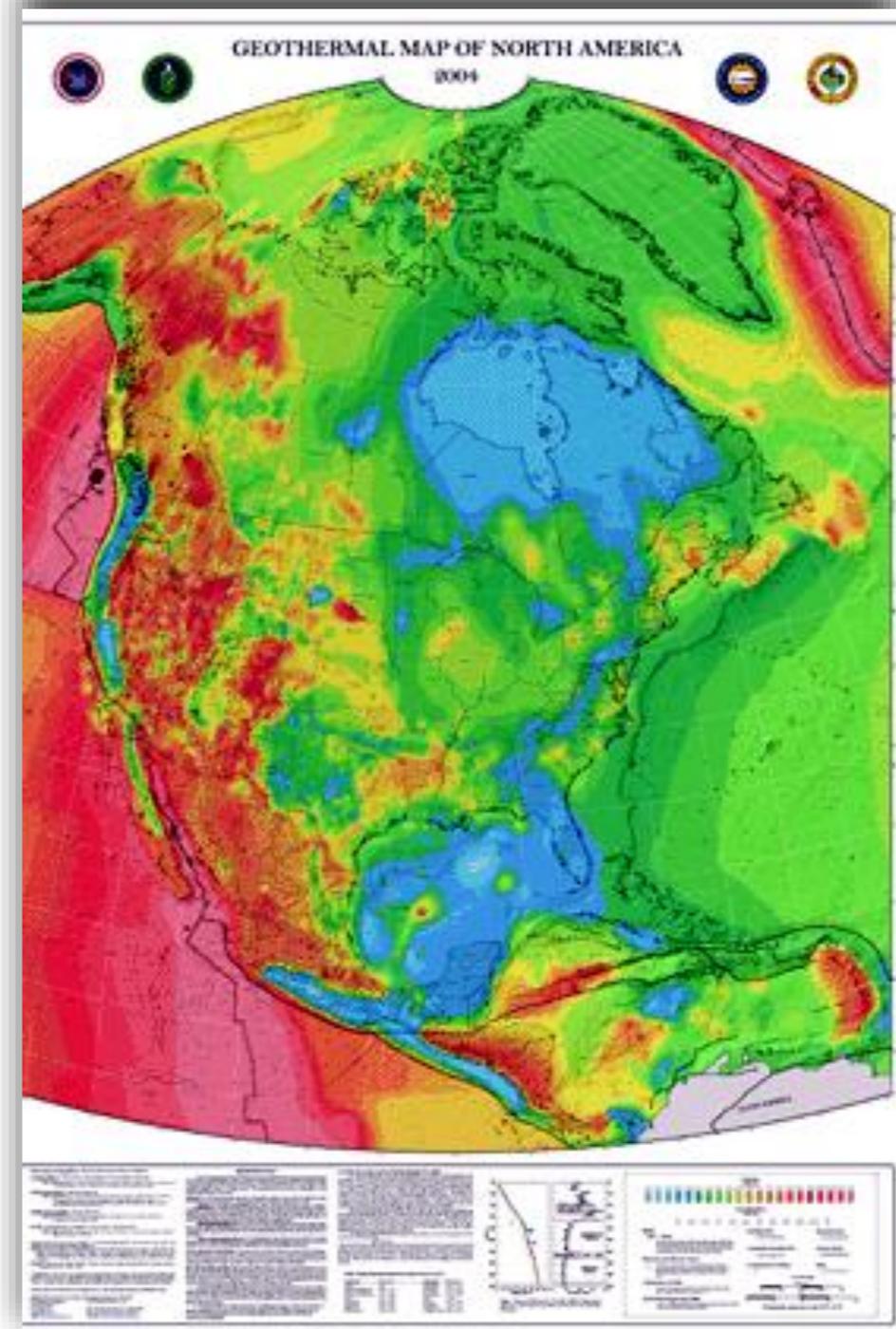
For example, the mineral waters of the spa town

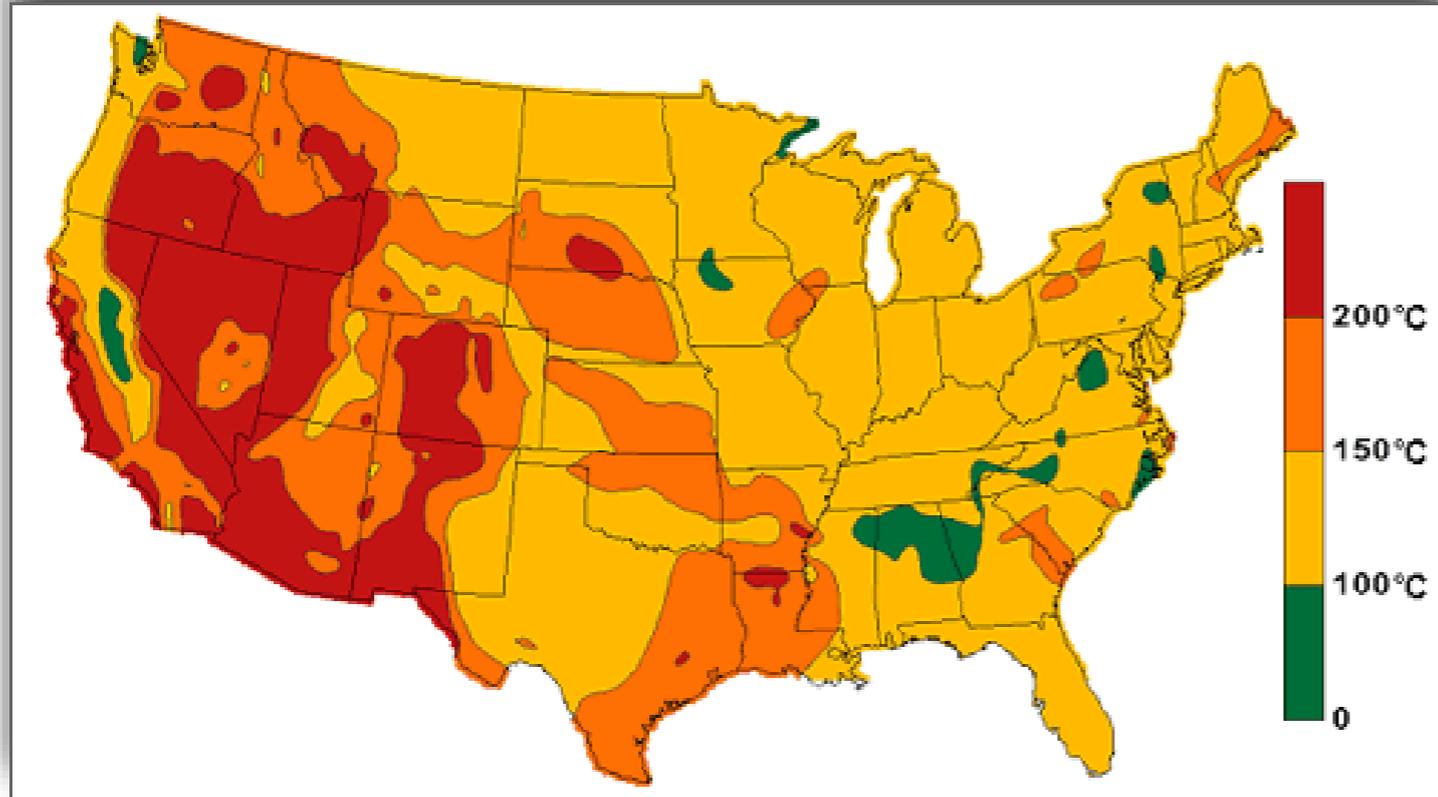
Truth or Consequences, NM have been carbon dated

at 25,000 years. Soaking in these ancient mineral

waters has been a practice for millennium by man and

animals, insects and star reflections.

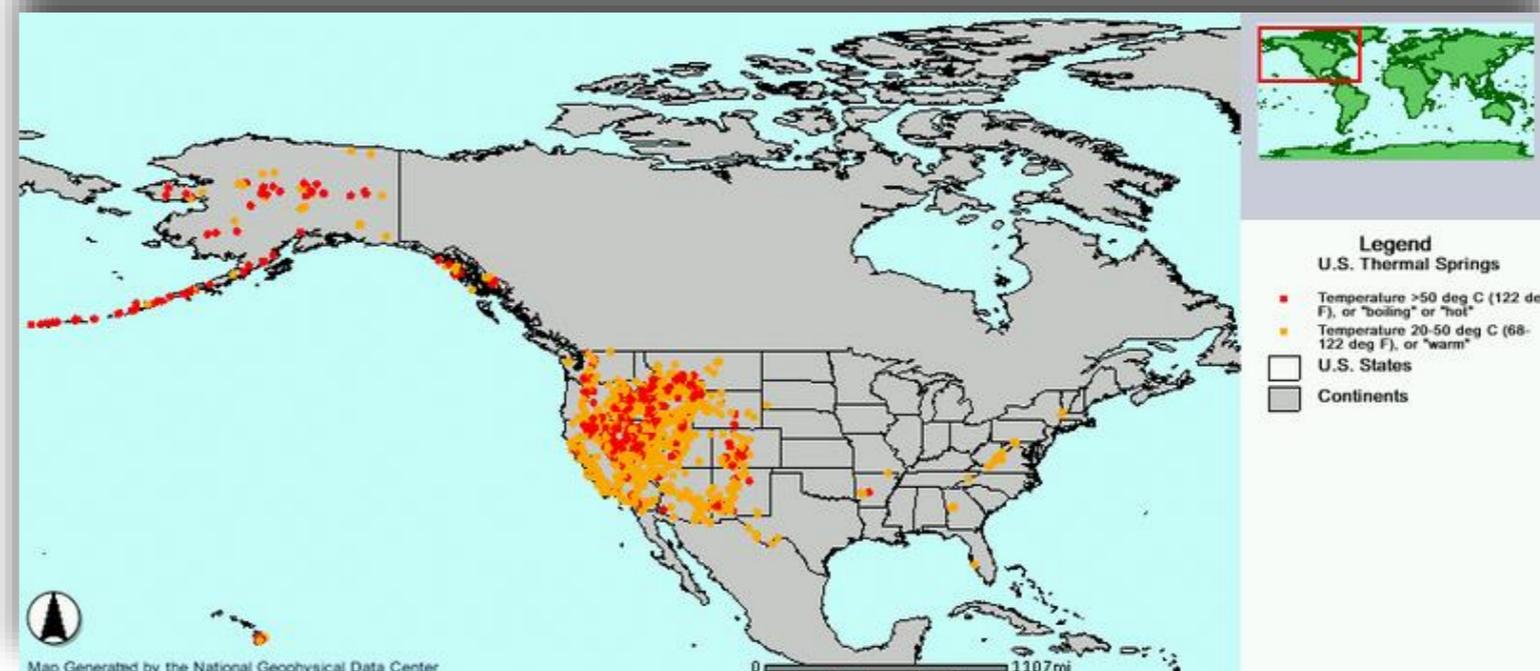




Thermalism in the United States

**Temperatures Range from
200 C Western Regions (392 F)
29 C Eastern Regions (85 F)**

Major Hot Springs in the US



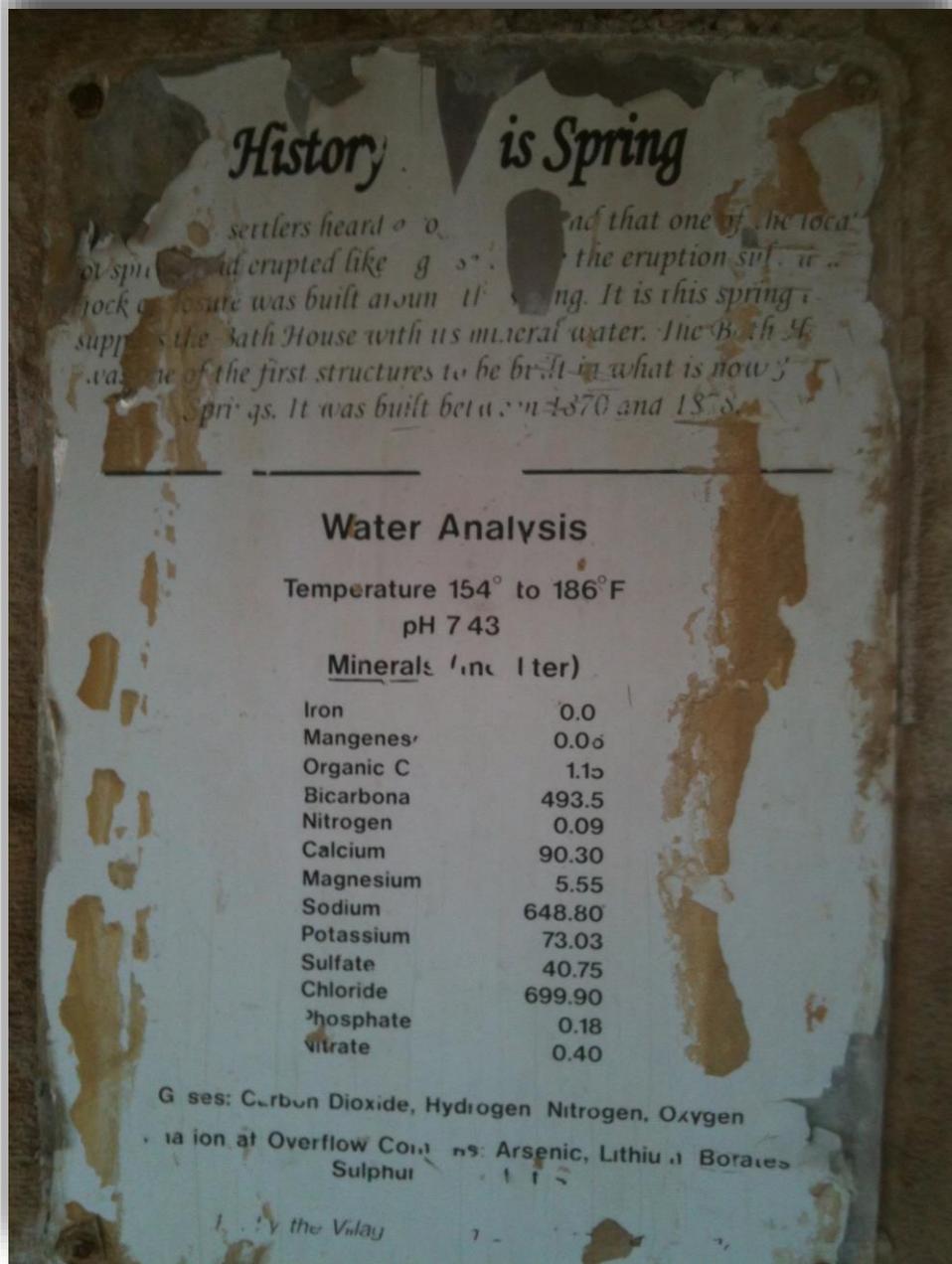
The Waters Hosted in Contemporary Times

Nature's hospitality hosts thermal mineral waters from the deep Earth to the surface.

Through the esteemed dedication of Water Stewards one can “take the waters” for an experience of wellness as time and rest in many community's in North America.

The 21st Century will see the renaissance of established health practice in North American Medicinal Springs





Traditional Use

What is the water at this source “good for”?

Balneology health claims range from general to specific as well as from anecdotal to proven.

In North America we lack the robust academic support for Balneology as we see abroad. Correcting this is central to BANA’s mission.



Dr. Wilkinson's Case Study

In 2020, during the midst of the Covid-19 pandemic, Thermal Mineral spring sites across North America took the forced closure as a time to recalibrate. For some it meant changing policies in order to remain open, for others an opportunity to rebrand and update.

Dr Wilkinson's Backyard Resort & Mineral Springs in Calistoga, California took the opportunity to begin with an initial meeting to understand the goals of their leadership and to understand the process of the BANA Source-Site Specific Identity program with Phase I which includes: Membership to BANA: An initial meeting with our directors of BANA: Submission of a water analysis, which concludes with a Traditional Use BANA Certification.

With travel and hospitality restrictions lifting the waning days of this pandemic, a forthcoming site visit will continue the process of Dr. Wilkinson's Mineral Springs fully developing their Source-Site Specific Identity with Phase II which includes: A BANA site visit to observe and experience natural mineral water applications and site specific qualities: a conclusion of A Site-Specific-Source Profile of your waters.



Calistoga's famous waters shared the benefits of mineral soaks and mud baths with over a million travelers and wellness seekers from around the globe.



Traditional Use Certification

A designation awarded by BANA based on historic and traditional uses of waters reflected in an up-to-date mineral analysis of your Source.

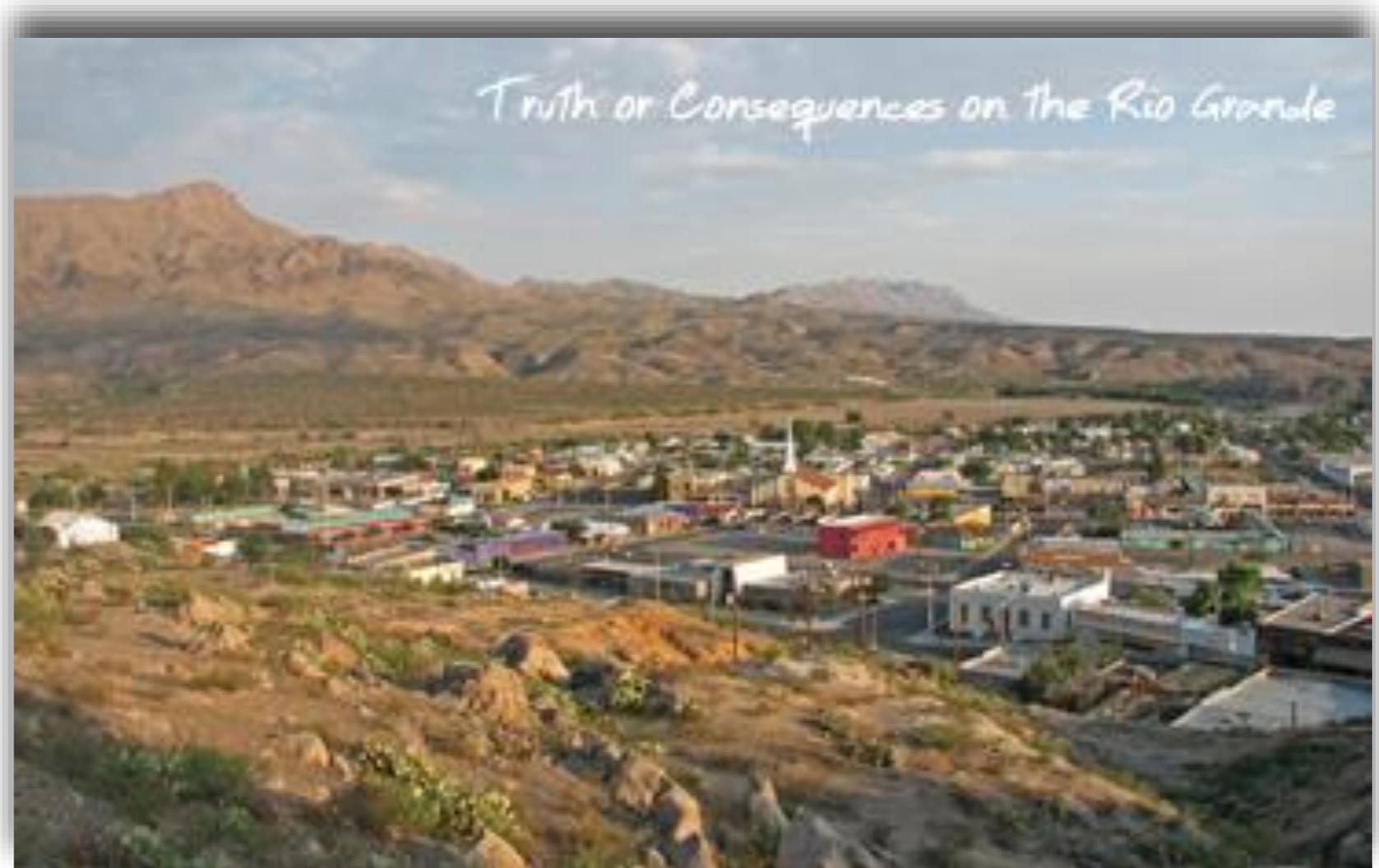
Your Guest can be directed to this designation as an education tool. It does not confer medical advice. It is a third party designation used to help the health tourist deepen their experience and choice of their health vacation.

Let's take a look at six geothermal spa towns and *what they say about their water.*

Truth or Consequences, New Mexico

The thermal mineral water has no unpleasant odor. The quality component is chloride, a naturally occurring germ killer that sterilizes the skin and ensures the purity of the water.

Take the [“21 day soak” regimen](#), said to cure “anything that ails you.” – soak in our hot springs once daily for 21 days, at around the same time each day, and spend as much time resting & recovering immediately afterward as you “take the waters”.



Hot Springs, Arkansas

Bathing in or drinking the water, “quaffing the elixir”, has been a public commodity since 1832, when President Andrew Jackson deemed what’s now Hot Springs National Park protected land.



1880-1950 was the Golden Age of Bathing at Hot Springs National Park.

Berkeley Springs, West Virginia

In myriad writings about the waters, they are uniformly described as clear and bright. Content analysis shows carbonates, sulphates and nitrates predominate among the minerals of the water, with magnesium carbonate the most abundant. These minerals give the water its trademark alkalinity and hardness. Carbonic gases are also present, and more oxygen than in other of the principal thermal springs along the Blue Ridge. emerging at 74 F.

Samuel Kerchival, in his celebrated 19th century work, A History of the Valley of Virginia, elevates the warm springs at Bath (now Berkeley) to paramount position labeling them the “most ancient watering place in the Valley.



Thermopolis, Wyoming

In the early 19th century a sizable medical community formed in Thermopolis, centered around the hot springs and treating those visiting in hopes the water would restore their health. Eight hot springs pools of 27 minerals including bicarbonate, sulfate, chloride, calcium, magnesium and sodium are featured. Mineral spring water emerging at 127 degrees Fahrenheit.



Calistoga, California

World-famous for thermal waters infused with rich minerals, heated to over boiling temperatures, as it passes over dormant molten magma, right below the earth's surface.

For hundreds of years, people have known that soaking in this rich mineral water has health benefits including; Stress and pain relief, increased blood circulation and has been known to improve sleep patterns. High in sulphur emerging at 180 F.

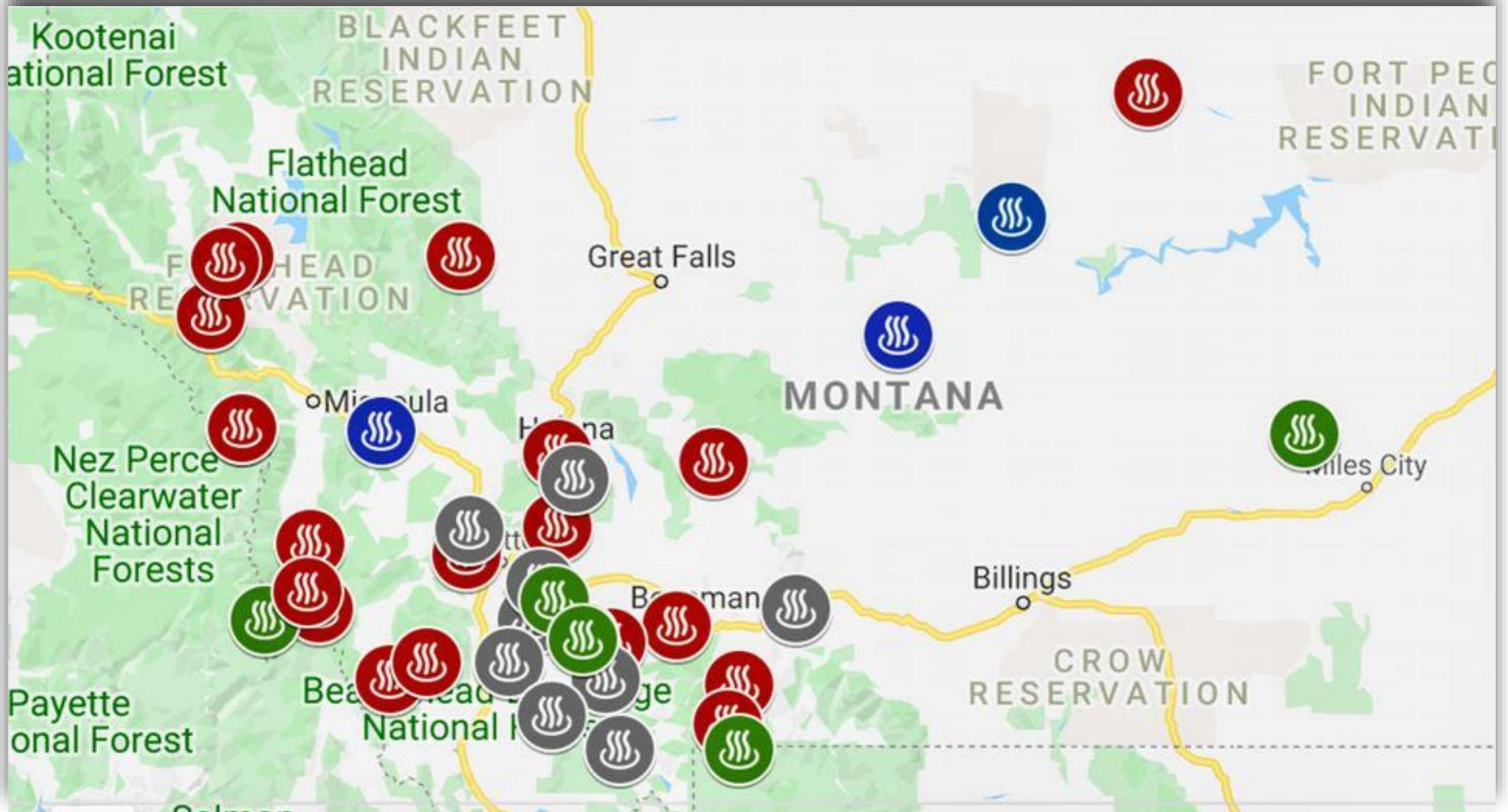


Desert Hot Springs, California

Thermal mineral waters originate from the Desert Hot Springs Aquifer, which continues to be heated by ancient geothermal forces thousands of feet below the earth's surface from two geological water sources, an ancient deep cold water table and a thermal lake. Minerals include sulphur, sodium chloride, bicarbonate and silica, the waters emerging at 180 degrees Fahrenheit are believed to hold curative powers.



Next Up: The Montana Health Basin



Hormesis - a new 'H' for the BANA Best Practices?



Hormesis is a biologically favorable response to low exposures to toxins and other stressors

Micro-Climate therapy is a standard aspect of European Balneology research. From certain sought after medicinal springs in Japan, to caves across Russia to Austria - low dose exposures to radiation have a long standing draw for health tourists. The anecdotal benefits are supported by research showing this **HORMETIC** effect



The Free-Enterprise Radon Health Mine Boulder, MO

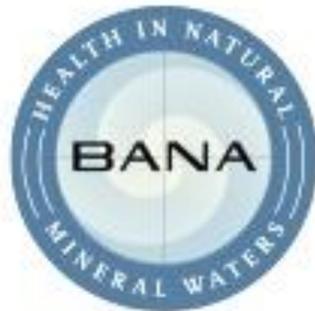
Re-Classification

BANA is working with leadership and policy makers across North America to support Site-Specific-Source owners in creating a unifying understanding, language, and relationship to the healing waters. And by doing so to renew the understanding of the unique health properties of thermal and mineral spring



HOT SPRINGS
BUSINESS & TRADE ASSOCIATION

*Immersed in the business of
health, healing and wellness.*



BALNEOLOGY
ASSOCIATION
of NORTH AMERICA

H  **T SPRINGS**
CONNECTION



FEMTEC since 1937

WORLD FEDERATION OF HYDROTHERAPY AND CLIMATOTHERAPY



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International Efforts

The Essential Nature of Balneology

Expanding beyond North America, BANA is teaming with international efforts through FEMTEC to produce a three year project aimed at establishing balneology as an essential health practice for the 21st century. On the heels of the global pandemic the BANA/FEMTEC partnership has identified the renewed need for confirmation of Balneology's role in the emerging 21st century healthcare paradigm. Amongst the classic roles of health intervention, rehabilitation, and wellness, we will be establishing the essential nature of convalescence.



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Thank You from Balneology Association of NA

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