

Along the Korean Demilitarized Zone



Boundaries & Frontiers

What's the difference?

A **BOUNDARY** is a line established by law, treaty, accord or practice that marks the limit of a political unit's territory. It is synonymous with **BORDER**.

FRONTIER can mean different things

- Nowadays it is often synonymous with border.
- Originally, an area lying beyond a country's territory and into which it could expand.
- In U.S. history, territory at the farthest extent of the country's settled or inhabited regions.
- Lightly settled territory adjacent to a remote non-demarcated boundary.

Other kinds of unoccupied and/or “un-owned” territory between states

- **No Man's Land.** Land between opposing armies that neither controls.
- **Demilitarized Zone.** An un-owned tract of land created by protocols that marks a former “front line” between warring parties.
- **Buffer Zone.** (A) Synonymous with either of the above. (B) A zone of weakness that lies between major powers and it intended to mitigate conflict between them. Classically consists of one or more States that are militarily weak.

Boundary Between the Two Koreas



Korean DMZ from the Southern Side



Along the southern side of the DMZ



Principal Types of BOUNDARIES

- Ethnic/cultural
- Physiographic/Natural
- Geometric

Ethnic/Cultural Boundaries

- Conform to the borders between traditional ethnic homelands or borders between culture groups.
- More commonly used as boundaries between civil divisions than between States.
- Difficult to define and prone to change, and thus problematical as State boundaries due to lack of certitude.



Physiographic/Natural boundaries correspond to a component of the physical environment, such as

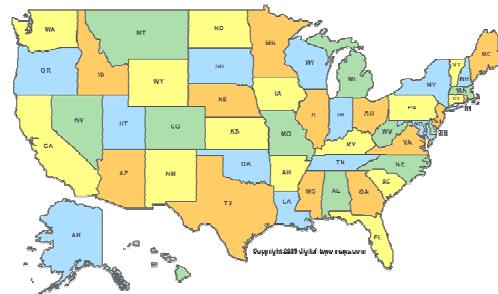
- Coastlines
- Rivers
- Lakes
- Mountain ranges
- Ridge lines
- Watersheds

[Problems: Not always permanent or easy to define and/or demarcate.]

Geometric Boundaries are straight lines drawn to reflect

- Latitude
- Longitude
- An expanse connecting two well-defined points agreed to by treaty.

Geometric boundaries necessitate a common system of latitude and longitude. Because they are abstract concepts, they are not prone to change by geomorphic agencies or human actions.

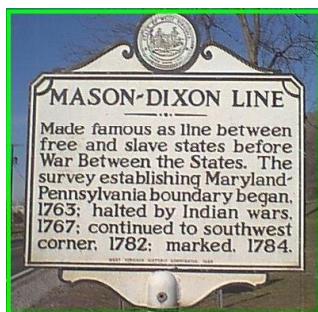


The Mason-Dixon Line is the border between Maryland and Pennsylvania (Lat. $39^{\circ} 43' 20''$). Most of it was surveyed between 1763 and 1767 by Charles Mason and Jeremiah Dixon to resolve property disputes between what were the two colonies.

It later became the unofficial dividing line between "The North" and "The South."

It is significant to political geography as the world's first latitudinal border to be demarcated on the Earth's surface.

Somewhere on the border between Maryland and Pennsylvania



The Mason-Dixon Line (Latitude $39^{\circ} 43'$ North)



Visual Classification of Boundaries

- **Natural.** No evidence of demarcation. There is no human alteration of the landscape that indicates the presence of a border.
- **Soft.** Demarcations exist but do not impede trans-border movement (e.g., signs, markers, a cleared area cut through a forest).
- **Hard.** Demarcation in the form of physical barriers to trans-border movement (e.g., walls, fences, gates, barbed wire, land mines).



Rhine River
German | Swiss Border at Diessenhofen



U.S. – Canadian Border
(Derby Line, Vermont | Stanstead, Quebec)



**U.S. – Canadian Boundary at Waterton Lake
(Montana | Alberta)**



**Somewhere along the
border between
Norway | Sweden**



**One of several remaining original markers that
demarcate the Mason-Dixon Line**



El Paso–Juarez Border Crossing

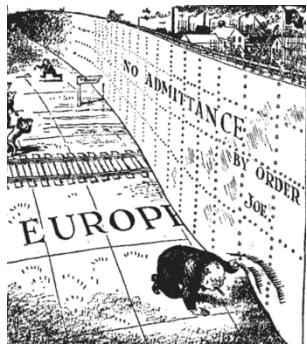


**A portion of the wall separating
The United States and Mexico**



Location of the Iron Curtain





Remnant of the Iron Curtain
Czech Republic



The Berlin Wall



Berlin Wall
at the Brandenburg Gate



Checkpoint Charlie



The Process of Boundary Making

- Definition – formal agreement (preferably in writing) between the parties concerning where a boundary should be.
- Delimitation – plotting the definition on maps (which ideally are detailed, accurate and alike) to facilitate actual location of the boundary.
- Demarcation – placing physical marks on the earth to show a boundary's precise location.
- Administration – establishment of processes between the parties to maintain the boundary.

Kinds of Boundary Disputes

- Definitional
- Locational (concerns delimitation and demarcation)
- Operational
- Allocational
- Nonconsensual

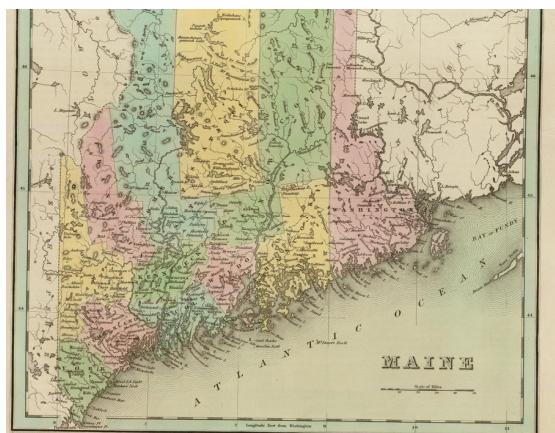
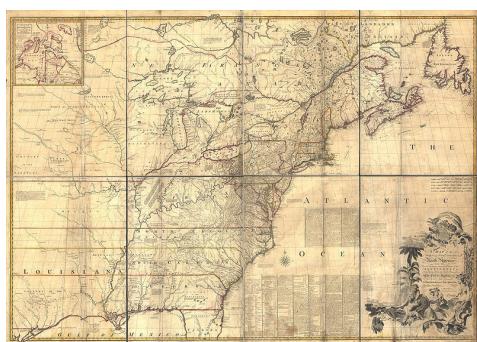
Definitional Boundary Disputes

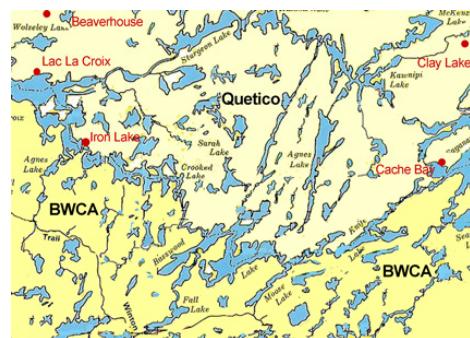
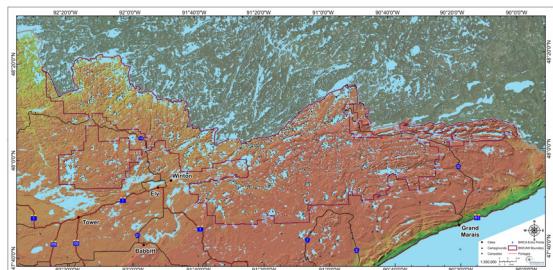
- Treaty language causes confusion
 - Maine/New Brunswick
 - Minnesota/Ontario
 - Strait of Georgia
 - Chile/Argentina
- A condition, intrinsic to the definition of an established boundary, changes
 - El Paso/Juarez
 - Mississippi river borders
 - Nigeria/Togo

The Definitive Treaty of Peace, 1783 defined the boundary between the United States and British North America as extending from the mouth the St. Croix River in the east to the northwestern point of the Lake of the Woods, following the most common water route. But . .

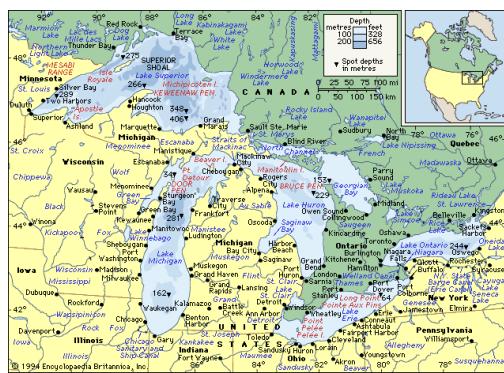
- Which river was the St. Croix? There were so many, and they had different names.
- What was “the most common route” from Lake Superior to Lake of the Woods?

Mitchell Map, ca. 1755
Used to help draft the Treaty of Paris, 1763





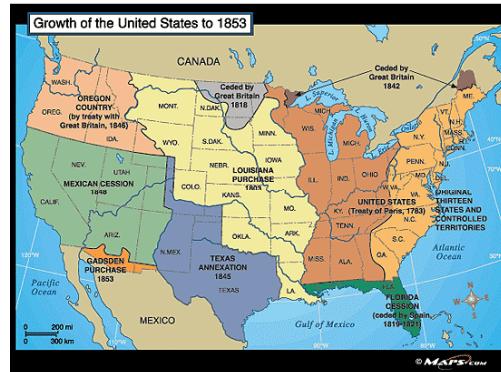
Paddling Canoe Country © www.canoecountry.com



Mitchell Map, ca. 1755
Used to help draft the Treaty of Paris, 1763



Growth of the United States to 1853





The San Juan Islands

Disputed following the Oregon Treaty of 1846



The Argentina-Chile Border Dispute

- The two countries share the world's third-longest border (some 3,300 miles).
- Dates from the dissolution of the Viceroyalty of Peru at the end of Spanish rule, leading to the creation of the two countries.
- Treaty called for the Andean Cordillera to be their common border.
- Problem I: Does that mean a line that connects the highest peaks or, or one that follows the watershed?
- Problem II: Maps produced by the two countries did not agree.



The screenshot shows a Microsoft Internet Explorer window displaying a news article from Mercopress. The headline reads "Argentina revives long time border dispute with Chile in Patagonian ice fields". The article discusses a dispute over a 100-kilometer stretch of the border in the southern Patagonia region, mentioning the second largest reserve of potable water in the world. The date is Tuesday, February 15th, 2011, 20:01 UTC.

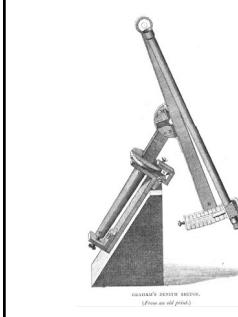
Locational Boundary Disputes

- Problems arise because maps used in the drafting of a treaty turn out to be erroneous. (Example: Lake of the Woods)
- Problems arise because it proves difficult to locate features essential for delineation and demarcation. (Example: the shared Argentina/Chile cordillera).
- Disagreement arises over a boundary's exact location. (Examples: PA-MD border in colonial times; St. Croix estuary in ME-NB.)

**Mitchell Map, ca. 1755
Used to help draft the Treaty of Paris, 1763**

This is a historical map titled "MICHILL'S MAP OF THE BRITISH COLONIES IN AMERICA" from 1755. It shows the eastern coast of North America, including the British colonies from Nova Scotia down to the southern tip of Florida. The map is divided into four quadrants, with a small inset map in the top left corner. The title is at the bottom right, and there is decorative foliage at the bottom left.

A Zenith Sector



- Any one of several devices once used by surveyors to determine their latitude by calculating the angular elevation of celestial objects.
- The one shown, some 12 feet tall, is the type used by Mason and Dixon.

Operational Boundary Dispute

- Disagreement occurs over how a boundary should function. (Example: The Berlin Wall; U.S. wall construction along Mexican border.)
- Disagreement occurs over the maintenance of a boundary.

<http://www.internationalboundarycommission.org>





Allocational Dispute

- Disagreement occurs regarding resource use within a boundary area
- Iraq/Kuwait dispute over Rumeila oil field.
- US/Canada dispute over fishing limits in the Atlantic
- Numerous disputes related to international rivers and lakes.

Nonconsensual Boundary Dispute

- Disagreement occurs over a boundary that was imposed on a State without its consent, and is thus perceived to be illegitimate.
- Numerous examples of former colonies whose nationals had no say in the creation of its borders.
- Numerous examples of grievances resulting from post-war boundary adjustments.