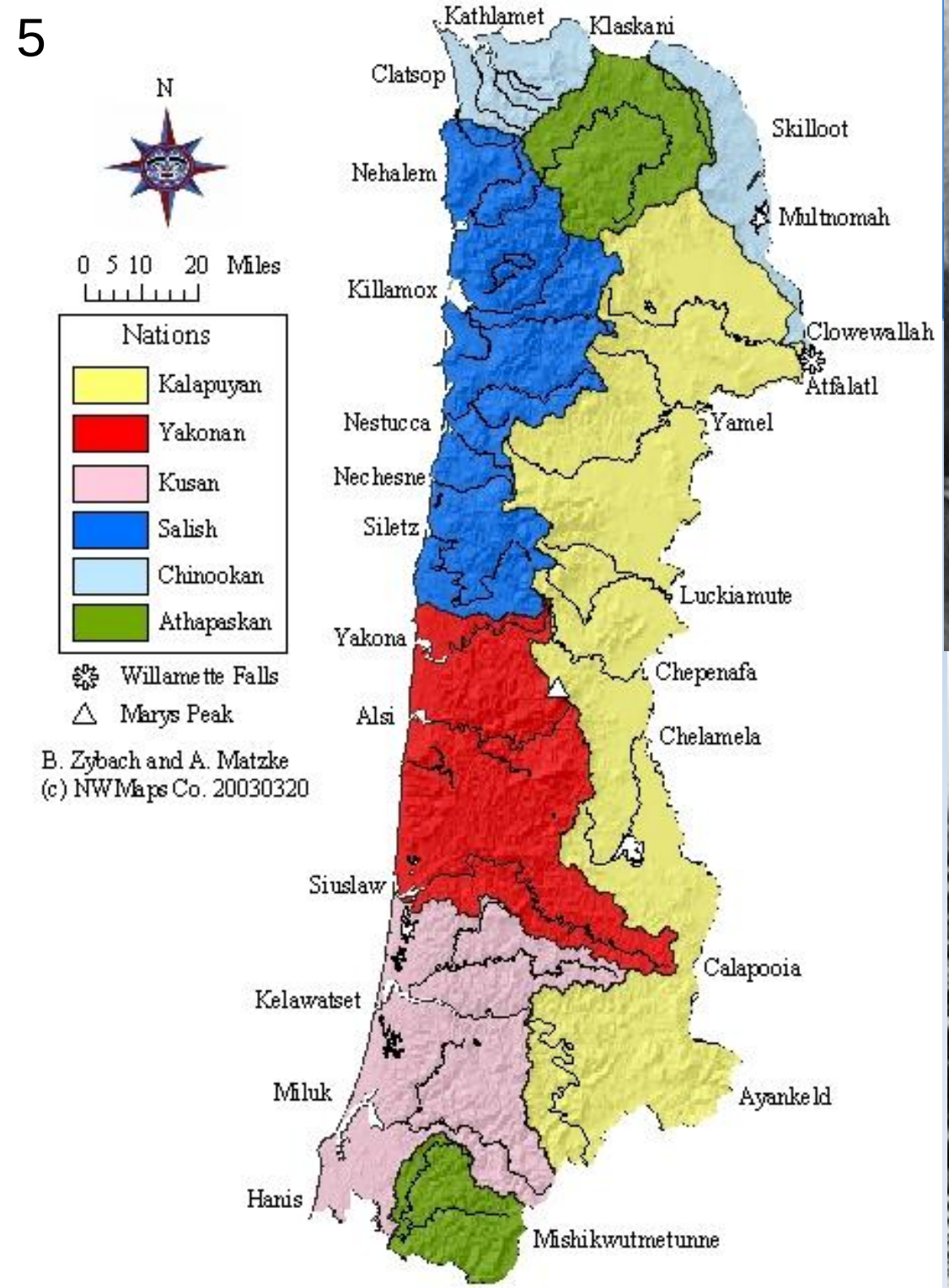
- What is sand?
- Where does it come from?
- Waves and wave energy
- How global climate change will influence waves
- and wave transport
- Dune types and formation
- Natural dune communities
- Introduced beachgrass and influence on beach and dunes
- Surf zone and sand dwelling organisms and food web
- Snowy plover biology
- Oregon beach law
- Field trip


FIGHT
for
BEACHES


3

Timeline?

5




Tsinistum
(Jeannie Michelle,
Clatsop)

Legislative timeline

- -8000 years to 1859: public beaches :-)
- William Clark walks Clatsop Beach

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ole village

Legislative timeline

- -8000 years to 1859: public beaches :-)
- William Clark walks Clatsop Beach
- 1859 Oregon statehood
- 1874 Oregon state land board sells tidelands, counties designate shore as roads

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13

Legislative timeline

- -8000 years to 1859: public beaches :-)
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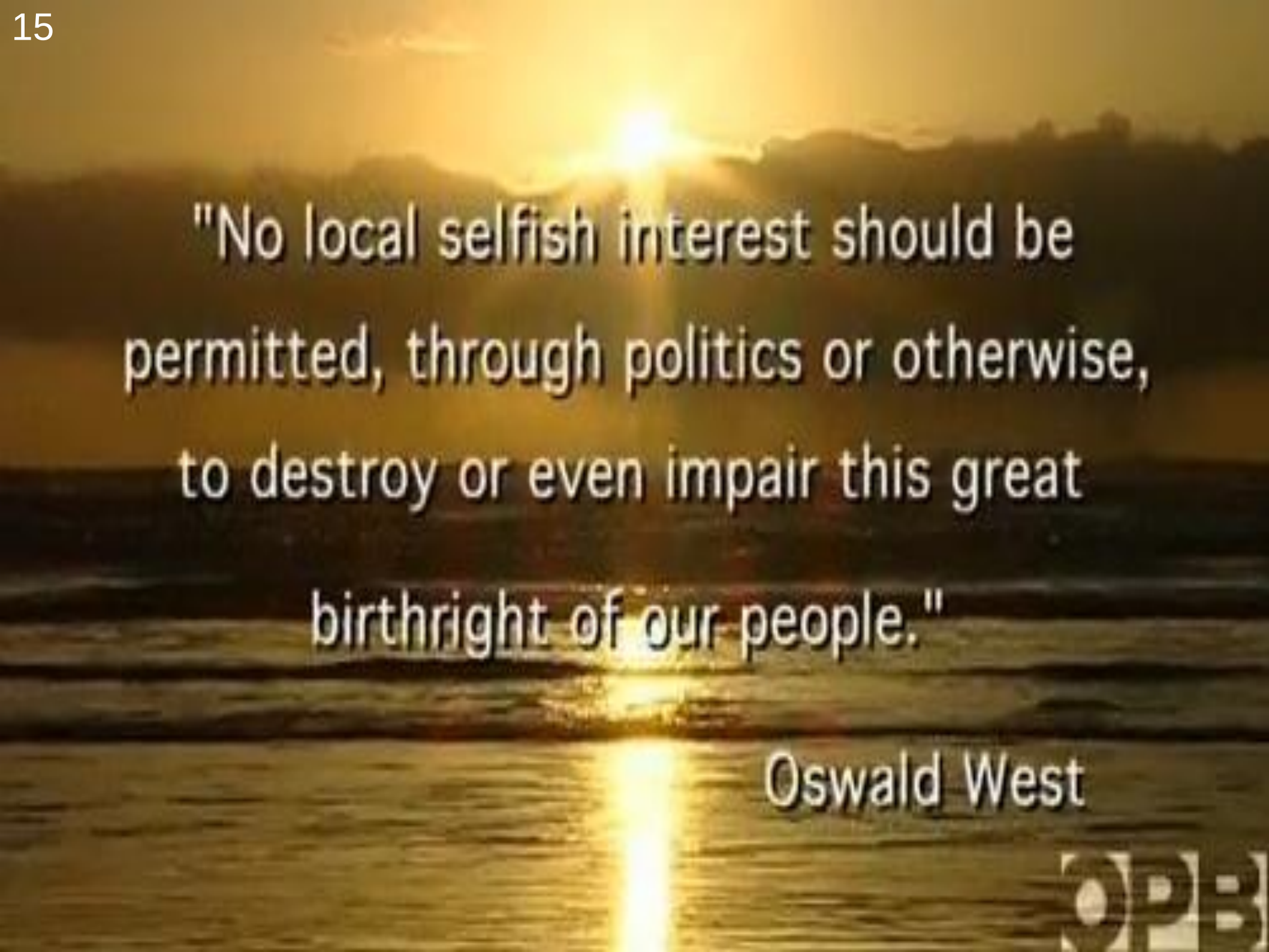
- 1874 Oregon state land board sells tidelands, counties designate shore as roads
- 1911 Oswald West elected governor
- 1913 Entire Oregon shore = state highway. State Highway Commission formed

http://www.csc.noaa.gov/magazine/back_issues/apr98/sec4c.html


"No local selfish interest should be permitted, through politics or otherwise, to destroy or even impair this great birthright of our people."
Oswald West

Legislative timeline

- -8000 years to 1859: public beaches :-)
- William Clark walks Clatsop Beach
- 1859 Oregon statehood
- 1874 Oregon state land board sells tidelands, counties designate shore as roads
- 1911 Oswald West elected governor
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- 1913 - 1932 construction of US 101 in OR

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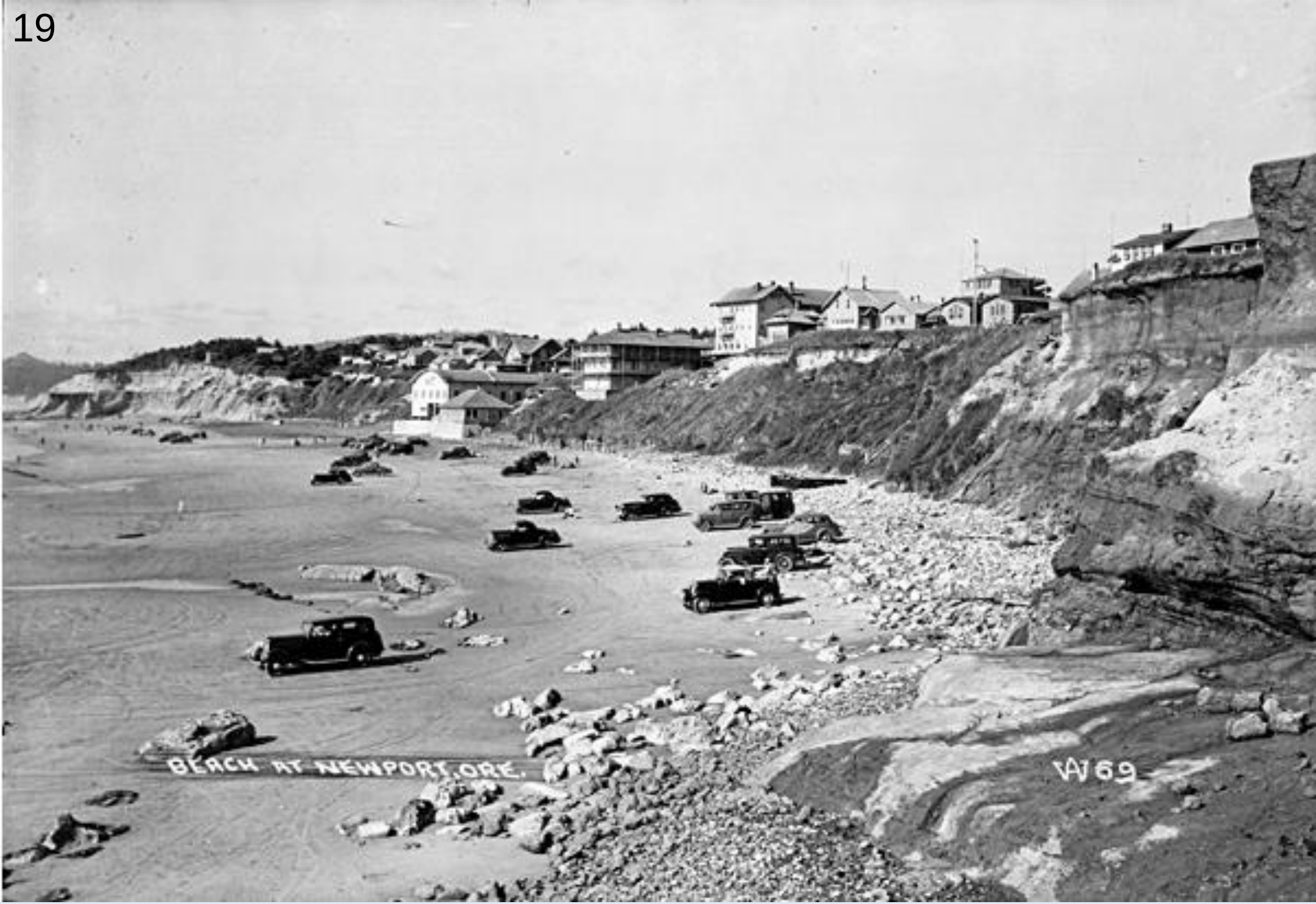
CANNON


BEACH AT NEWPORT, ORE.
W69

Legislative timeline

- -5000 years to 1859: public beaches :-)
- William Clark walks Clatsop Beach
- 1859 Oregon statehood
- 1874 Oregon state land board sells tidelands, counties designate shore as roads
- 1911 Oswald West elected governor
- 1913 Entire Oregon shore = state highway. State Highway Commission formed
- 1913 - 1932 construction of US 101 in OR
- 1913 - 1950 purchase of 36 State Parks along US 101
- 1965 Entire Oregon shore = state recreation area
- 1967 Oregon Beach Bill

http://www.csc.noaa.gov/magazine/back_issues/apr98/sec4c.html

390.610 Policy. (1) The Legislative Assembly hereby declares it is the public policy of the State of Oregon to forever preserve and maintain the sovereignty of the state heretofore legally existing over the ocean shore of the state from the Columbia River on the north to the Oregon-California line on the south so that the public may have the free and uninterrupted use thereof.

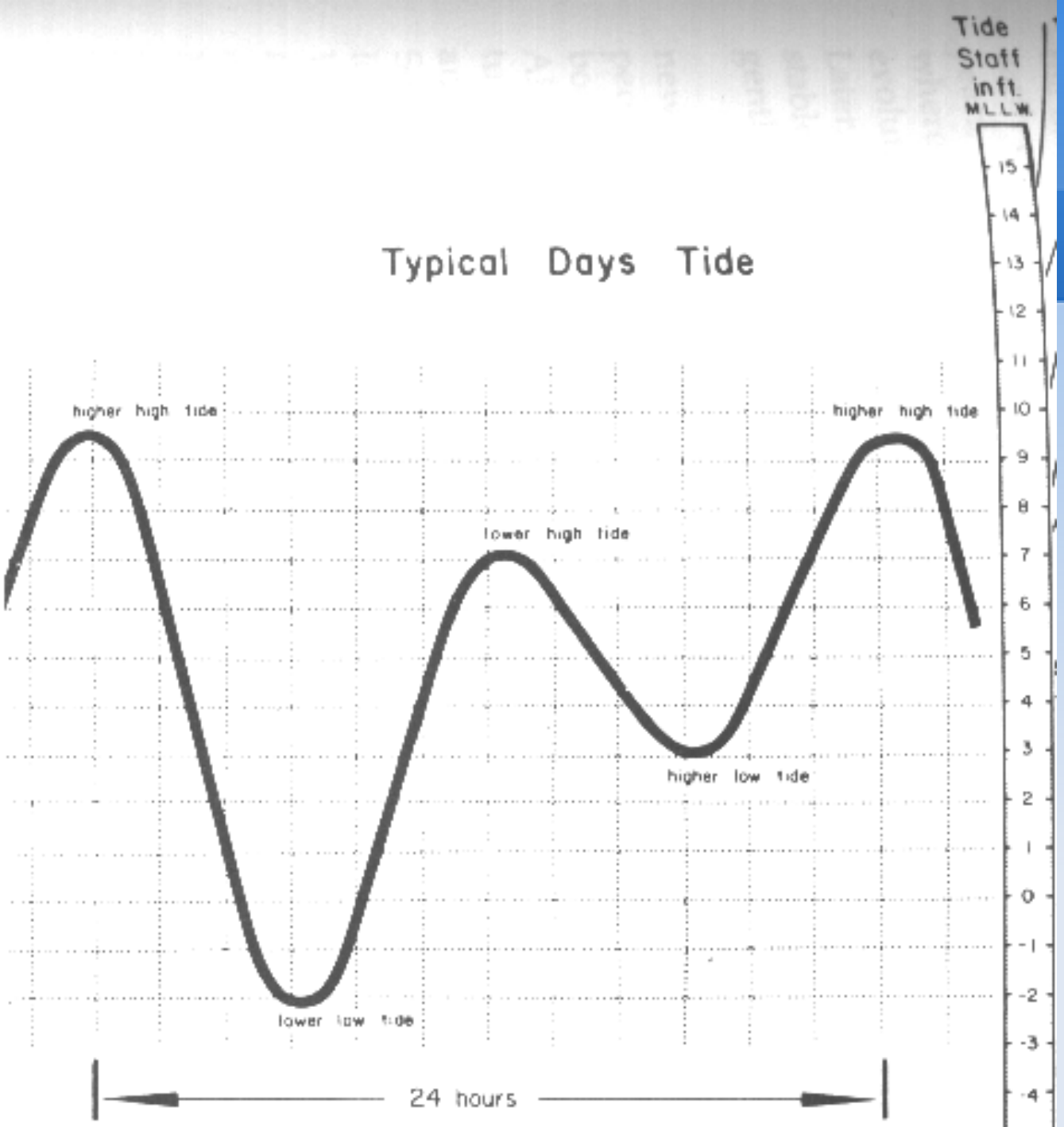
(2) The Legislative Assembly recognizes that over the years the public has made frequent and uninterrupted use of the ocean shore and recognizes, further, that where such use has been legally sufficient to create rights or easements in the public through dedication, prescription, grant or otherwise, that it is in the public interest to protect and preserve such public rights or easements as a permanent part of Oregon’s recreational resources.

(3) Accordingly, the Legislative Assembly hereby declares that all public rights or easements legally acquired in those lands described in subsection (2) of this section are confirmed and declared vested exclusively in the State of Oregon and shall be held and administered as state recreation areas.

(4) The Legislative Assembly further declares that it is in the public interest to do whatever is necessary to preserve and protect scenic and recreational use of Oregon’s ocean shore. [1967 c.601 §§1,2(1),(2),(3); 1969 c.601 §4]

(2) “Ocean shore” means the land lying between extreme low tide of the Pacific Ocean and the statutory vegetation line as described by ORS 390.770 or the line of established upland shore vegetation, whichever is farther inland. “Ocean shore” does not include an estuary as defined in ORS 196.800.

390.770 Vegetation line described. Except for the areas described by ORS 390.760, ORS 390.640 applies to all the land located along the Pacific Ocean between the Columbia River and the Oregon-California boundary between extreme low tide and the lines of vegetation as established and described according to the Oregon Coordinate System, as defined by ORS 93.330, as follows:



Note: Specific elevations are based on six years of tide observations at the Oregon State University Marine Science Center Dock on Yaquina Bay. Values have been reduced by the National Ocean Survey (formerly the Coast and Geodetic Survey). The elevations differ from estuary to estuary and from different points within an estuary. The exception is MLLW which is zero by definition.

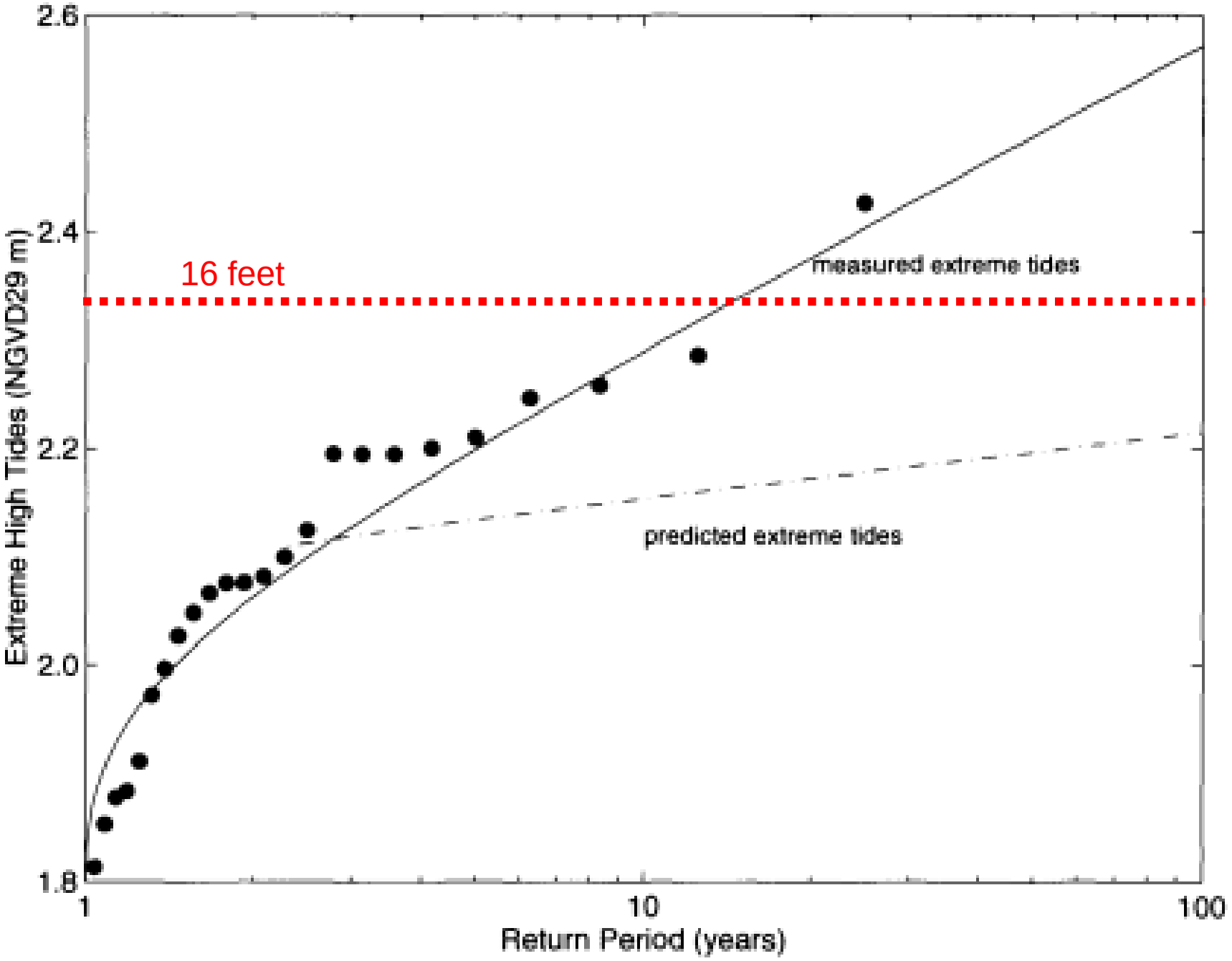


Figure 7. Gumbel extreme value distributions fitted to measured tides (solid line) and predicted tides (dashed line), permitting assessments of extreme tide levels.

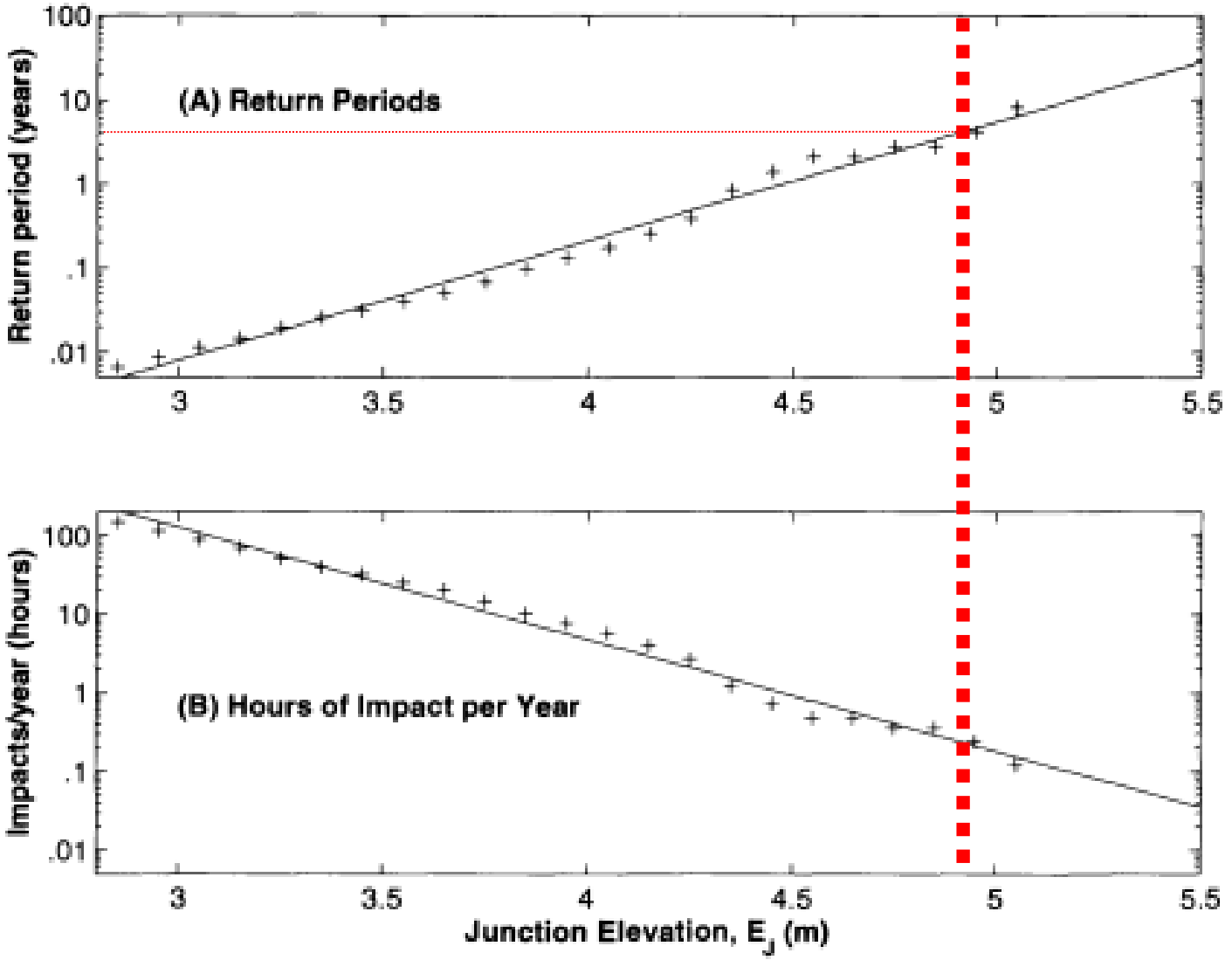


Figure 8. (A) return periods for simulated total water levels determined by combining both measured tides and runup calculated with equation (4) and based on wave measurements. (B) The equivalent hours of wave impact per year during which 2% of runup maxima reach or exceed the elevation E_J.

Tom McCall
Robert Straub
Bob Bacon
Matt Kramer

Website:
http://www.csc.noaa.gov/magazine/back_issues/apr98/sec4c.html