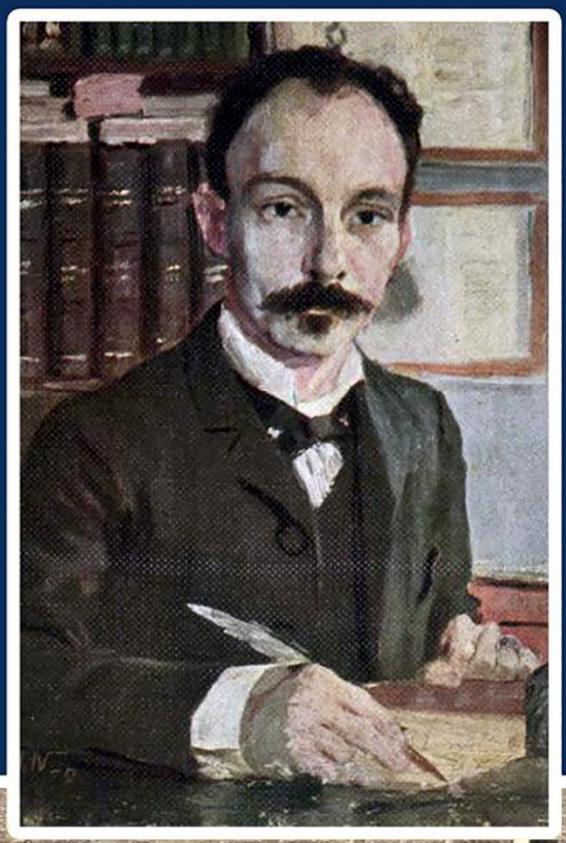
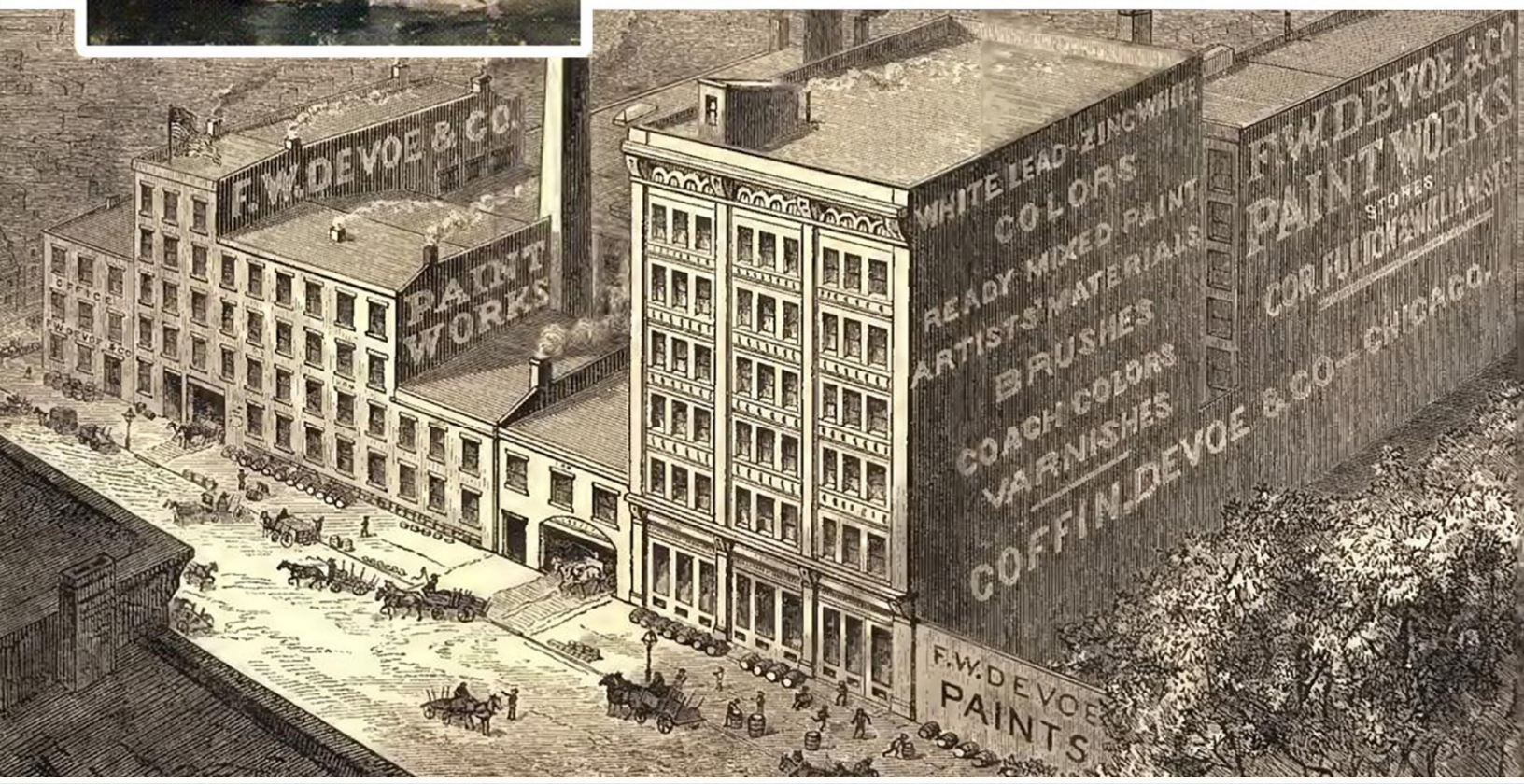


Fuentes y enfoques del periodismo de José Martí en el mensuario *La América*



Alejandro Herrera Moreno

Referencia: Alejandro Herrera Moreno: "Formación geológica de Cuba". En: *Fuentes y enfoques del periodismo de José Martí en el mensuario La América* (pp. 107-109). Edición Fundación Cultural Enrique Loynaz, Impresión Editora Búho, Santo Domingo, República Dominicana, 2018.

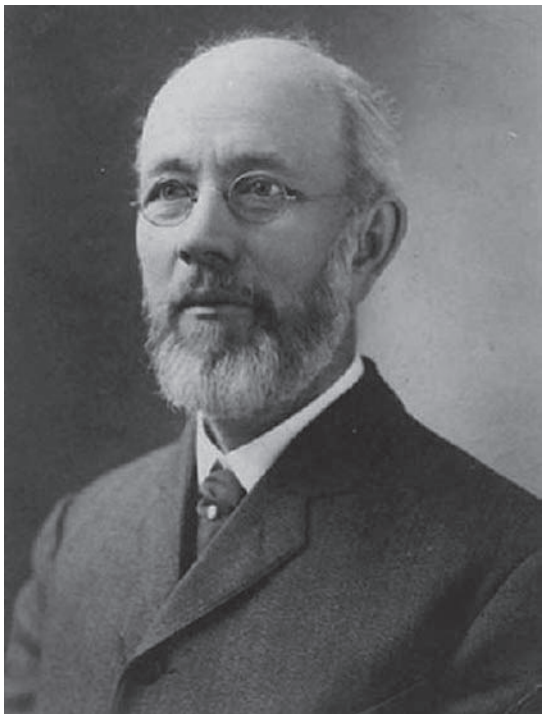
Formación geológica de Cuba

En abril de 1884, bajo el título "Formación geológica de Cuba", José Martí da a conocer en *La América* los resultados de un estudio geológico que describe las terrazas marinas[1] como una formación típica de ciertas partes del litoral cubano. Dice Martí: "El *Engineering* ha publicado un curioso estudio de los altos arrecifes de coral que rodean la isla de Cuba, y Mr. Crosby, que es el autor del trabajo…"[2] Se refiere al artículo científico "On the elevated coral reefs of Cuba", publicado por el geólogo norteamericano William Otis Crosby (1850-1925) en las Actas de la Sociedad de Historia Natural de Boston en noviembre de 1883.[3]

"El *Engineering* ha publicado un curioso estudio de los altos arrecifes de coral que rodean la isla de Cuba, y Mr. Crosby, que es el autor del trabajo y lo llevó a cabo sobre los mismos arrecifes, halla en estos, nuevos argumentos en defensa de la teoría geológica de Darwin".

Para hacer su noticia, Martí no emplea directamente el trabajo de Crosby, que es un artículo especializado de seis páginas, sino que se vale de una reseña titulada "The Coral Reefs of Cuba" que había aparecido en la sección "Notes" del periódico semanal británico *Engineering* de octubre de 1883[4]. Para el cotejo de textos (Cuadro 1) hemos mantenido la continuidad de ambas versiones, pero divididas en nueve partes según los diferentes temas que sobre las terrazas se van abordando: origen según la teoría de Darwin, disposición, niveles, altura, ubicación, grado de conservación, composición, ejemplos de localidades y situación en el contexto geológico antillano.

La noticia martiana es una traducción literal en doscientas ochenta y nueve palabras del original en inglés que tiene doscientas sesenta y cuatro. Hay coincidencia en las cifras de las elevaciones y sus unidades (pies y varas), las referencias geográficas (Habana, Matanzas, Yunque de Baracoa y Jamaica) y hasta la estructura de los párrafos. La teoría de Charles Darwin (1809-1882) que se menciona al comienzo de la noticia original alude a la obra *La estructura y distribución de las rocas de coral*, conocida por Martí de su crónica tras la muerte del científico inglés[5]. En toda la noticia la traducción es clara y concisa para comunicar con exactitud contenidos científicos, como el difícil término "subsidencia" (progresivo hundimiento de una superficie) que lo sustituye por: "...la Isla se ha venido sumergiendo lentamente". Solo al traducir dos términos geológicos, buscando mayor entendimiento ("terraplenes" por "terraces" y corrosión por "erosion"), se aleja del concepto geológico original.



Cuadro 1. Comparación de los textos íntegros de "Formación geológica de Cuba" de José Martí y la reseña del trabajo de William Crosby sobre las terrazas marinas de Cuba en el diario inglés *Engineering*.

José Martí	***Engineering***
"El *Engineering* ha publicado un curioso estudio de los altos arrecifes de coral que rodean la isla de Cuba, y Mr. Crosby, que es el autor del trabajo y lo llevó a cabo sobre los mismos arrecifes, halla en estos, nuevos argumentos en defensa de la teoría geológica de Darwin. Parece que la Isla se ha venido sumergiendo lentamente.	"A study of the elevated coral reefs of Cuba has been recently made by Mr. W. O. Crosby, an American, and his conclusion is that they indicate slow subsidence of that island during their formation, and hence that Darwin's theory of the origin of coral islands is the true one.
Los arrecifes están dispuestos en terraplenes a lo largo de la Isla, especialmente en los lados Norte y Este.	The reefs are in terraces along the sides of the island, especially on the northern and eastern sides of the island.
El terraplén más bajo tiene 30 pies de alto y su ancho varía de unas cuantas varas a una milla. Era claramente el arrecife que formaba la costa en otro tiempo.	The lowest terrace is 30 ft. high, and varies in width from few rods to mile. It was obviously the fringing reef of the shore at one time.
El segundo terraplén se eleva bruscamente desde el nivel del más bajo a una altura de 200 a 250 pies.	The second terrace rises abruptly from the level of the lower to height of 200 ft. to 250 ft.
El tercero tiene una elevación de 500 pies y el cuarto de 800.	The third reef has an altitude of 500 ft. the fourth of 800 ft.
Estos terraplenes corren alrededor de toda la Isla, pero están mejor conservadas las partes que corresponden al lado occidental, donde la corrosión ha sido menos rápida, y a la cima de las colinas más elevadas.	These terraces run round the whole island, but are best preserved on the western part of the island, where the erosion has been less rapid, and on the summits of the highest hills.
Las colinas alrededor de la Habana y Matanzas, que alcanzan a una elevación de 200 pies, están formadas enteramente por la caliza coralífera.	The hills about Havanna and Matanzas, which reach height of 200 ft., are entirely composed of reef-limestone.
En la montaña El Yunque, cinco millas al occidente de Baracoa, la roca coralífera alcanza un espesor de 1,000 pies y constituye la parte superior de la misma, formando su parte inferior las rocas pizarrosas y eruptibles. En un principio el límite superior de estas rocas coralíferas debe haber estado a 2,000 pies sobre el nivel del mar.	In the mountain of El Yunque (the Anvil), five miles west of Baracoa, the reef-stone is 1000 ft. thick, and composes the upper part of the mountain, the lower part being of slate and eruptive rocks. Originally the upper limit of this reef-stone must have been 2000 ft. above the sea level.
Las rocas coralíferas de la Jamaica son de la misma altura, y es probable que durante su formación la región de las Antillas quedara reducida a pocas islas pequeñas". [p. 109]	The Jamaica reef stones are of the same altitude, and it is probable that during their formation the Caribbean area was sunk until the Great Antilles were reduced to few small islands". [p. 344]

Notas

1. Una terraza marina o costera es un accidente geográfico que consiste en una plataforma que ha sido expuesta como resultado de la combinación de dos fenómenos: variaciones del nivel del mar y cambios tectónicos (movimientos de la corteza terrestre) de alzamiento y subsidencia (elevación o hundimiento de una superficie) a lo largo de la costa.
2. José Martí: "Formación geológica de Cuba", en *La América,* Nueva York, abril de 1884, OCEC, t. 19, p. 109.
3. William Otis Crosby: "On the elevated Coral Reefs of Cuba." Proceedings of the Boston Society of Natural History, noviembre 1883, 22, pp. 124-129. [Fuente de la imagen de William Otis Crosby: https://webmuseum.mit.edu]
4. "The Coral Reefs of Cuba", en *Engineering: an illustrated weekly journal,* London, 12 de octubre de 1883, p. 344.
5. JM: Carta de Nueva York expresamente escrita para *La Opinión Nacional.* "Darwin ha muerto", en *La Opinión Nacional,* Caracas, 17 de mayo de 1882, OCEC, t. 11, p.180.

the continuous current machine (Fig. 2). In the former, M M are the cast-iron plates carrying the field magnets A A; B is the wooden table, mounted on the fixed armature, with metallic contact pieces by which the different grouping of the coils is effected; C is the shaft of the machine; D the collector; and E the lamp circuit. Fig. 2 shows the arrangement of the direct-current machine. In this type all the armature coils are used to excite the field magnets, and the collector brushes are connected to both ends of the armature wire. The entering wire of one of the series of field magnet coils goes to one segment of the collector, the opposite wire of the other communicates with a copper ring placed at the end of the shaft. The second segment of the collector is connected to a second copper ring, placed beside the first. These two rings are grooved, and in these grooves lie the brushes at the ends of the lamp circuit. Fig. 3 shows the commutating table arranged for coupling in tension, each south pole being coupled to the adjacent north pole. The dotted lines on the same figure show the grouping for quantity, all poles of the same name being connected. The following Table gives the various types of machines made by M. Chertemps:

Number.	Dimensions.			Weight.	Diameter of Pulley.	Revolutions.	Number of Lights.			Horse-Power.
	Length.	Width.	Height.				Arc.	Candles.	Incandescent.	
	in.	in.	in.	lb.	in.					
0	8.66	18.90	11.81	88	2.36	1250 to 1300	..	..	4	.5
1	11.81	24.41	13.78	231	4.72	1250 ,, 1300	2	4	30	3
2	13.78	27.56	19.69	418	6.29	1150 ,, 1200	5	8	50	5
3	19.69	35.43	23.62	660	8.66	900 ,, 1000	6	10	70	8
4	21.68	37.40	27.56	880	11.81	700 ,, 800	8	14	100	10

In addition to the foregoing, M. Chertemps exhibits a differential arc lamp shown in operation in connexion with one of his alternating current machines.

NOTES.

Fire Alarms in Nottingham.

The telegraphic fire alarms which were erected last March throughout the borough of Nottingham by the National Telephone Company, have proved themselves in every way a great boon to the town. A large majority of the fires which have occurred since they were erected have been signalled by these alarms, thereby saving much property, if not life. In nearly every instance the brigade has been able to leave for the scene of the fire within the minute after hearing the alarm. The houses of all the firemen are in telegraphic connexion with the central fire station, and the men can be summoned in a few seconds. There are twelve stations in the borough, one in each of the principal streets. While upon this subject we may mention that the Bright fire alarms are also being extended in London. There are now from 400 to 500 in the metropolis.

A New Insulator.

A new insulating material has been brought out by Mr. E. T. Truman, of Old Burlington-street, W. It consists essentially of plumbago or blacklead mixed with gutta-percha, india-rubber, or ozokerit. When the gutta-percha is of poor quality the proportions are 50 parts of gutta-percha and 30 parts of graphite; but the better the gutta-percha the greater the proportion of graphite which can be used, up to 50 per cent. The graphite, which must be very dry, helps, according to Mr. Truman, to preserve the gutta-percha. The blacklead is chosen for its high insulation in the first place, then is carefully sifted, dried, and mixed with the gutta-percha in a masticator or condenser. The resulting insulator is applied to wires by the ordinary machines for covering. Ozokerit may also be mixed with the compound in small proportion. A blacklead surface of a protective character is also given to gutta-percha wires by Mr. Truman; and its lubricating surface assists in the manipulation of the wires in pipes. While upon this subject we may mention that the conducting wires for the electric lighting of the Italian Opera House will be covered with asbestos after the plan patented by the United Asbestos Company, and made by them. The asbestos being non-inflammable is particula
adapted for theatre installations.

The Coral Reefs of Cuba.

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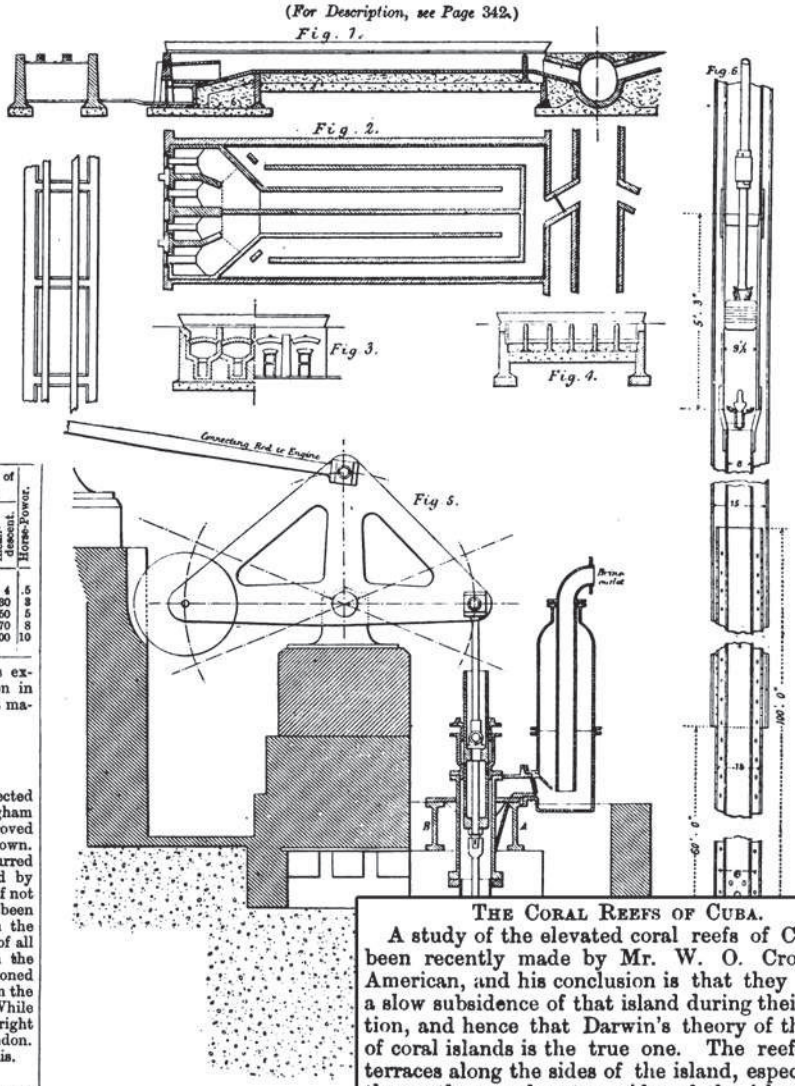
THE CLARENCE SALT WORKS, MIDDLESBROUGH.

(For Description, see Page 342.)



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