

Contents lists available at ScienceDirect

Geoforum

journal homepage: www.elsevier.com/locate/geoforum





Of ships and soundboxes: Contrapuntal explorations of hydrocoloniality and the materiality of music

Diego Astorga de Ita

Department of Geography, Durham University, Lower Mountjoy, South Rd, Durham DH1 3LE, UK
Instituto de Investigaciones en Ecosistemas y Sustentabilidad, Universidad Nacional Autónoma de México, Antigua Carretera a Pátzcuaro 8701-No. 8701, Sin Nombre, IIES-UNAM, 58190 Morelia, Mich., Mexico

ARTICLE INFO

Keywords: Music geography Sotavento Material culture Heterotopia Ecopoetics Ethnography

ABSTRACT

In this paper I explore the relation between music, (enviro)materiality, and coloniality by examining son Jarocho, the music of the Mexican region of Sotavento in southeast Mexico. This essay brings together geography, blue humanities, and ecomusicology, using notions of hydropoetics and hydrocolonialism, building upon the material turn in music geographies. I approach the phenomenological confluence of Sotaventine cedar chordophones and ships using and critiquing Foucauldian theoretics, alongside Hofmeyr's hydrocolonialism and Gilroy's circumpelagic theories. I survey the regional histories of luthiery, shipyards and timber trade and their connections, counterpointing these histories with the poetics of son Jarocho and with materials gathered through interviews and music-making alongside musicians and luthiers in Sotavento. From this I propose that musical aesthetics emerge from navigations that are topophilic and imperial. I counterpoint the Sotaventine case with the history of violins and their link to pau-brasil exploitation in Brazil, following ecomusicological works. Surveying histories of cedar and pau-brasil I argue that exploitation and exploration are a univocal aspect of the hydrocolonial project that entangles the biological, geographical, military, and mercantile into the endeavour of the exploração and that this informs musical materialities, poetics, and aesthetics to this day. Lastly, I briefly consider the implications of the hydrocolonial history of musical matters in the context of the Anthropocene. Una versión en español de este texto está disponible en los materiales suplementarios.

- "...would the name mariners be the essential word for poets?"
- -Elucidations on Hölderlin's Poetry, M. Heidegger.
- '¡Yo no soy marinero!
- ¡Yo no soy marinero!'
- -La Bamba, traditional son Jarocho.

1. Sotaventine waters and circumpelagic theories

Boats are an everyday thing. At least in Sotavento, the gulf coast region of eastern Mexico and the leeward hinterland of the port of Veracruz, marked by the Papaloapan and Coatzacoalcos rivers and their many tributaries (García de León 2009; Domínguez Pérez 2015). Up and down rivers, seas, and lagoons, watercraft navigate day in and day out as fishermen, travellers, tourists, and musicians traverse Leeward waters: A

group of musicians — locals and tourists — comes to the banks of an affluent of the Coatzacoalcos. We reach the road's end here; it begins again across the river. We are returning from a fandango, a musical gathering revolving around *son* Jarocho, the traditional music of Sotavento. We drive onto a ferry that will cross us into Tacamichapan, the island where we're camping as part of a yearly seminar on son Jarocho organised by "Los Cojolites", a notorious son Jarocho group. The ferry ride isn't long, but as *son* musicians often do while travelling in groups in public transport, people pull out their instruments and start playing as we cross the river. We play *La Bamba* — that folk-tune-turned-rock-classic-turned-everything. ¹ Its familiar refrain fills the air and water as people dance on the ferry's deck (see Fig. 1):

¡Ay arriba y arriba y arriba iré!

E-mail addresses: diego.astorga-de-ita@durham.ac.uk, dastorga@iies.unam.mx.

¹ Originally part of the traditional son Jarocho repertoire, *La Bamba* became a worldwide phenomenon with Ritchie Valens' 1958 rock'n'roll version. Since then, it has become myriad things, from a jingle in Tex-Mex food advertisements to "inspiration" for *Twist and Shout*. Nevertheless, it is still played as a folk tune in fandangos throughout Sotavento.

¡Yo no soy marinero!
¡Yo no soy marinero!
¡por ti seré!
¡por ti seré!
¡por ti seré!
"Oh up, and up,
and up I'll go!
I am no sailor!
I am no sailor,
I'll sail for you".

Boats are an everyday thing and have been throughout Sotaventine history; from canoes used since precolonial times in fluvial and coastal navigations, to Spanish ships that first arrived in Veracruz carrying Cortés and his soldiers (burnt to stop the men from even thinking of going back, according to legend); to colonial Caribbean smugglers' sailboats. The importance of navigation is due as much to the hydrology of the region—both the Papaloapan and Coatzacoalcos are large navigable rivers reaching the Gulf of Mexico—as it is to its history.

Veracruz was the first Spanish *Ayuntamiento* founded in mainland America, and became an entrepôt of great cultural, political, and economic significance since it was also the only Atlantic port of New Spain during the Spanish occupation of the region. Because of this, American and Asian commodities — like those of the Manila Galleon — were shipped to Europe from this port, while European merchandise arrived in the continent through Veracruz. Thus, El Sotavento and *son* Jarocho were formed through a complex colonial history in which Spanish, African, and American peoples encountered each other — clashing and collaborating — and in which sailing was a crucial endeavour (Chaunu 1960; García de León 2004, 2014).

The region's navigational history can be heard in its music. *Sones* (folk tunes or airs) like the aforementioned *Bamba*, *El Fandanguito*, or *El*

Balajú, among numerous others, speak of Leeward waters in melody and verse, from landlocked lagoons to the faraway shores of what Sotaventine historian and musician Antonio García de León calls the Greater Caribbean: 'a constellation of ports, an archipelago of warehouses and walls pointing "to the seas", a world open to outside influences, a page where things are permanently written and re-written' (2002: 31). The Greater Caribbean echoes Gilroy's Black Atlantic, a 'rhizomorphic, fractal structure of...transcultural, international formation' (2022: 4), an expanded territory defined by its 'desire to transcend both the structure of the nation state and the constraints of ethnicity and national particularity' (Ibid., 17). While Gilroy's Black Atlantic considers the Black experience and the formation of modernity focusing on Britain and the English-speaking world, García de León's Greater Caribbean considers the Spanish Atlantic and its conformation over the longue durée. When I refer to the Black Atlantic in this essay, I refer to both García de León and Gilroy's oceanic theories, since both are part of the same expanded sea resulting from a long hydric history that calls for a 'circumpelagic analysis devoted to addressing culture as, and in, water' (Gilroy 2018: 5).

Hydric history and life are present in the sounds and poetics of Sotaventine music, as well as in its materiality, since the instruments of *son* Jarocho are intertwined with watercraft used in different navigations, as we shall see throughout this text. In this paper I explore the juxtaposition of sailing and music in Sotavento, focussing on the materiality of these phenomena in relation to colonial mercantile and military explorations. In this context, we shall see how ecology, materiality, coloniality, aesthetics, and poetics come together, by surveying son Jarocho through a mixture of ethnographic methods, historical analyses, and poetic readings.

The ethnographic materials I present here come from fieldwork undertaken over the course of two years with son Jarocho practitioners in the region of Sotavento and beyond. My research involved musicking —



Fig. 1. Freddy Naranjo Vega plays jarana while Martha Vega sings. Río Chiquito, Tacamichapan, 2018.

learning, playing, singing, and dancing in workshops, gatherings, and fandangos — as well as conducting semi-structured and open interviews with musicians and luthiers, and observing the construction of son Jarocho instruments. While this led to a wide range of places, experiences, and perspectives on son Jarocho, here I focus mainly on the experiences of luthiers in Sotavento, and so hydric cities and landscapes, like Tlacotalpan, Tacamichapan, Los Tuxtlas, or the Port of Veracruz are the sites from which this text emanates. This paper then, stands at the crossroads of geography, the blue humanities, and ecomusicology; specifically drawing upon notions of hydropoetics and hydrocolonialism and building upon the material turn in music geographies and ecomusicology.

Musical-geographic scholarship is diverse, from ethnomusicological questions regarding the origins and diffusions of music-cultures (Carney 1974, 1998; Gold and Revill 2006; Kuhlken and Sexton 1991; Hudson 2006); to the way landscapes, cities, places and identities are produced and embedded with meaning through music and sound (Anderson 2004; Cohen 1995; Gibson 2002; Leyshon et al., 1995; Revill 1991, 1998, 2014; Whiteley et al., 2004); to the mobilities of performers and genres (Daynes 2004; Hancock-Barnett 2012; Miranda Nieto 2018); to the politics of performance, poetics, and sound (Anderson et al., 2005; Connell and Gibson, 2004; Dawe, 2003, 2004; Kruse, 2021; Morton, 2005; Revill, 2000, 2016). On the other hand, ecomusicological studies have explored the ways in which music and the environment relate to each other, though mostly through specific musical pieces and often in relation to the Western canon and Western landscapes (Allen 2011; Allen 2012a; Grimely 2011; Rehding 2013). While these musical explorations are important additions to both geography and ecocriticism, it is also important to consider the ways in which colonial histories inform music, its materiality, and its aesthetics. The colonial aspects of music, and specifically of the materiality of music, have been considered by authors like Allen, Gibson and Warren, and Martínez-Reyes (Allen 2012b; Gibson and Warren 2021, 2020, 2018; Gibson 2019; Martínez-Reyes 2021, 2015). However, explorations of aural-material ecologies and their colonial histories remain in the margins of ecomusicological and geographical research.

Given the importance of the Atlantic in Sotavento during its colonial history, notions of hydrocolonialism will be considered, as it is through transatlantic histories of colonialism that many material musical meanings emerge (Hofmeyr 2019; Bystrom and Hofmeyr 2017) To Hofmeyr, 'hydrocolonialism signals a commitment to understanding a world indelibly shaped by imperial uses of water' (Hofmeyr 2019:13, emphasis in the original); in this way, it is a useful framework 'to decolonize the ocean, refracting the different levels of colonial control exerted by means of, over, and through water' (Ibid.:12). On the other hand, while still incipient, the notion of 'enviromateriality', to use Martínez-Reyes (2016), has been linked to colonial geographies and ecologies. Gibson & Warren write of the materiality of guitars 'made from timber, they are extensions of colonial histories of dispossession, slavery, and worker exploitation' (Gibson and Warren 2021:9). In this way, the musical aesthetics of different instruments are the result of 'geographies carved from colonialism and mercantile trading, and shaped intimately by distant forests' (Ibid.:21). Musical material geographies can benefit from the notion of hydrocolonialism,² since 'a hydrocolonial framework makes visible the meanings and associations ... accrued ... over land and sea' (Hofmeyr 2019:17), and given that it was over land and sea that 'Europe's colonial aspirations expanded, and the tentacles of mercantile commerce extended across oceans and

continents, [making] new materials ... accessible to luthiers' (Gibson and Warren 2021:21).

While rivers are important hydric elements of El Sotavento, as shown by different authors (Velasco Toro 2003; Thiébaut 2013), rather than reexamine the role waterways have played in the conformation of Sotavento or its music, here I will explore how navigations — fluvial and transatlantic — relate to and have shaped musical aesthetics. We shall see not only the means through which 'new' materials came to be used in different luthier traditions, but also the phenomenological confluence of ships and chordophones in the context of a long colonial history from which different aesthetic experiences emerge.

Building upon the ecomusicological and geographical works previously mentioned, I counterpoint the ecologies of son with those of European violins. I approach the idea of counterpoint not merely as musical metaphor, but as a dialectic analytic praxis. I follow Edward Said's notion that 'in the light of decolonization' one must read 'retrospectively and heterophonically with other histories and traditions counterpointed against' (1994: 161). Contrapuntal readings imply 'a simultaneous awareness both of the metropolitan history that is narrated and of those other histories against which (and together with which) the dominating discourse acts' (Ibid.:51). In this way 'alternative or new narratives emerge' (Ibid.). Said proposes that alternative texts 'form a counterpoint to the Western powers' monumental histories, official discourses, and panoptic quasi-scientific viewpoint' (Ibid.:215). I propose that music and musical instruments — their materiality, the grain of the wood — can be used not as a text but as an artifact to counterpoint, decolonise, and deconstruct these grand narratives. In this way I counterpoint the guitar and the ship; the musical-ethnographic and the historic, the topophilic and the imperial, the Black Atlantic and the Foucauldian heterotropia, the material and the poetic. I counterpoint son Jarocho to Euro-Western musical and poetic expressions, exploring the botanic histories of Sotaventine and European luthieries, as well as the hydropoetics of son Jarocho alongside Heidegger's writings on riverine and mariner poetics. From this contrapuntal analysis I propose that the pelagic poetics of son can inform musics in the Anthropocene, in Sotavento and beyond.

2. As if they were boats

An important locale in Sotaventine history and music is Tlacotalpan, built in what once was an island in the Papaloapan. This small city with colourful colonial arcaded façades is famous for the festivities of La Candelaria — the Catholic Feast of Candles — celebrated between 31 January and 2 February, in which both son Jarocho and the River Papaloapan play an important role.

Son Jarocho is played with various instruments; the most common are different small chordophones, usually built of cedar (*Cedrela odorata*) and other tropical woods, like mahogany (*Swieetenia macrophylla*) and *chagani* (*Platymiscium dimorphandrum*). Despite its diverse instrumentation, one could say the three central instruments of Sotaventine son are the *jarana*, the *tarima*, and the harp. The first is a small chordophone with eight strings, strummed in specific rhythmic-harmonic patterns; the second is a wooden idiophone essential for fandangos, played by dancing upon it; the third gained notoriety with the popularisation of son Jarocho in the mid 20th century, becoming central to the stereotypical version of the music, especially in Tlacotalpan and the Papaloapan basin. These instruments, alongside small Sotaventine guitars, tambourines, lamellophones, equine jawbones, and others, are made by luthiers in cities and towns across The Leeward.

In Tlacotalpan lived one such luthier: Marcos Gómez Cruz, nick-named '*Taconazo*'. Taconazo's life story shall be the starting point for this exploration of ships and soundboxes, as his woodworking experience speaks of the confluence of boats and stringed instruments that lies at the heart of this survey. Through Taconazo's testimony we approach

² Especially when the histories of material aesthetics are considered. Nevertheless, studies of current supply chains, like Martínez-Reyes' (2015) can also benefit from engaging with the hydric turn, since concepts like Pritchard's hydroimperialism 'illustrate the fundamental connection between water, its regulation, and colonial or neocolonial relations in the modern era' (2012: 592).

 $^{^{3}}$ 'The Heel', 'The Big Heel' or 'The Notorious Heel'.

the materiality of music and move towards the colonial histories and ecologies that sound and are counterpointed therein.

When I was in Tlacotalpan doing fieldwork, a friend advised me to meet and interview Taconazo with a peculiar prompt:

"Visit him and take a look at his harps...
...he builds them as if they were boats."

2.1. On carpentry and the phenomenon of being of ships and soundboxes

Taconazo lived two blocks away from the Papaloapan. I met him briefly, a couple of years before he passed away. He had a carpentry workshop on the ground floor of his house with a shop/showroom in the front (see Fig. 2). Among cedar rocking chairs, coffee tables, and corner shelves there was a wood-and-glass cabinet displaying numerous jaranas, and a spool of fishing line. ⁴ Towards the back of the room stood a large harp.

While Taconazo was recognized as a prominent musician, luthier, and woodworker, he didn't always build instruments. During his youth, Taconazo was a riverside carpenter:

I used to build rowing boats, for the river...when I was fourteen, fifteen

years old...we sold them to the fishing folks...

He told me, through a greying moustache, sitting on a cedar rocking chair in his pink-panther-coloured porch (Fig. 3).

we would build many... two, three or four or five a week. With cedar wood [C. odorata], white wood, or sweet wood [Nectandra ambigens], or xochikuahua [Cordia megalantha] — that's a long timber, 5 or 6 m long.

(Gómez Cruz 2018)

Living in the banks of the Papaloapan, boats were essential to people's livelihoods and boatbuilding was an important job in the city. Taconazo's career as a carpenter started with river boats, and moved on to other things:

Afterwards I worked building furniture, and then I made doors and windows...and that's been my job. And singing. I've also sung quite a bit. (hear track 1 in supplemental materials)

Taconazo was a singer, verse-maker, and jarana player, in the prominent son Jarocho group 'Siquisirf' and in "folkloric ballets". In the attached recording (track 1) we hear him sing La Bamba. He sings the famous refrain with a slight variation while strumming rhythmically in one of the many jaranas he built:

Arribita y arriba y arriba iré yo no soy marinero por ti seré

Like many Sotaventine luthiers Taconazo learnt to build jaranas from observation. He watched his family members carving them out of blocks of wood and implemented his river carpentry know-how into the making of these instruments. Taconazo's career developed in and around the river, metaphorically and literally: while he was never a mariner, during the 1960 s he worked as a shopkeeper in a convenience-store-boat that travelled up and downstream to different towns on the banks of the Papaloapan.

Taconazo's work and life story illustrate a link that exists between ship and harp and wood and water, a link that tells us plenty about the phenomenology of these instruments and of this music. Before building harps, Taconazo built boats. His carpentry skills developed from making things for river life; these are the very same skills he used in building jaranas, guitars, and harps. But the kinship of these things — of boats and harps and other chordophones — becomes clear not only in the life story of Taconazo, as these objects of navigation share a genealogy that unfolds when we examine them and their materials throughout history.

3. Imagined shipyards and cedar canoes

In the last decades of the 18th century Colonel Miguel del Corral set out to explore the Leeward rivers, looking for potential sites for a shipyard. This was part of the official efforts to fortify the region in response to political instability and potential attacks from the British Navy during the many Anglo-Spanish wars (Siemens and Brinkmann 1976). Corral came up with two proposals: one for the mouth of the Coatzacoalcos, the other for Tlacotalpan. He favoured the latter, but in the end neither of his proposed shipyards came to be. These imagined shipyards, however, left behind a rich geographical account of Sotavento, especially of Tlacotalpan (del Corral and de Aranda, 1777a; del Corral and de Aranda, 1777b; del Corral, 1782).

Particularly relevant to us are Corral's accounts of watercraft, and of the materials used in their construction. Corral speaks of boats called bongos — 'canoes made from a hollowed-out tree trunk' (del Corral in Siemens and Brinkmann 1976: 274). Mahogany (S. macrophylla) and cedar (C. odorata) were 'particularly well suited to build these very gracious and spacious boats', according to Corral (Ibid.). Bongos were used in Leeward rivers throughout the colonial period (Velasco Toro, 2004) and were part of everyday life in these fluvial lands until recently, though now fitted with outboard motors.

The species used in the construction of bongos — cedar and mahogany — were also an important export from the American colonies, highly valued in Europe (Siemens and Brinkmann 1976; Reichert 2021; Velasco Toro 2004), Siemens and Brinkmann write that:

For centuries...cedar and mahogany had been exported from tropical New Spain. They were widely used in Europe for the construction of ships and, by the early eighteenth century, wardrobe manufacturers in England, including the famous Chippendale, used these woods in the construction of fine furniture.

(1976:279)

The shipyards in Havana and Cádiz were supplied with Sotaventine timbers, used for building ships for the Spanish Armada (Siemens and Brinkmann 1976; Reichert 2021). These and other American woods, abundant in Sotavento, were cut, processed and taken from the port of Veracruz to European metropolises for consumption.

Colonial consumption took at least two forms. Firstly, the transformation of timbers into ships which were used in service of colonial trade and of Empire; these ships, which transported merchandise from America to Europe, were themselves an American product, since they were built using American timbers in American shipyards. Secondly, the wood taken to Europe was used in buildings, furniture, and other wares. In this way, cedarwood became a commodity exported by colonial trade, while providing the infrastructure to reproduce this trade in the form of ships. We could think of the ship as a metonym for hydrocolonialism, as it enabled colonial trade and expansion, providing a material form for European imperial projects.

Two archetypal navigations emerge from the histories of Sotaventine cedar: one is that of the colonial ship transporting merchandise to the metropolis; the other, the carved-out bongos, used by Leeward peoples to navigate their local waters. One is imperial, the other topophilic. While the ship is hydrocolonial, Taconazo's experience speaks of topophilia.

"Topophilia? What is that?"

Asked Taconazo when I mentioned Tuan's concept (1990).

"This idea of love of the land, of one's own place".

I explained.

"Ah, well, we do have quite a bit of that here!" He replied.

⁴ Fishing line is often used to string jaranas.



Fig. 2. Carpintería 'La Fe'. Taconazo's carpentry/showroom in Tlacotalpan, August 2018.

Topophilia is present in Taconazo's experiences of watercraft, not only because he worked in a boat for years, or because he built cedar rowing boats for local fishermen, but because he built bongos in his youth:

I was in business with a man who had a bongo factory...I built loads for him!

(Gómez Cruz, 2018)

Taconazo's associate eventually went bankrupt and, as compensation, Taconazo received the business' power tools. He used them for years to build furniture and instruments and later sold them to a young luthier, who apprenticed under him.

It is significant that not only the same tools were used in the construction of boats and of instruments (at least in this case), but also that the techniques and the materials for building ships and stringed instruments are so closely related. Like bongos, jaranas and Sotaventine guitars are carved from a single piece of wood, and, like ships, they are built using predominantly cedar wood.

3.1. Cedar aesthetics

One could say cedar is the archetypal Sotaventine matter, particularly when it comes to musical instruments. Cedar is fragrant, repels wood parasites, and is a 'soft' wood, which means it is easy to work with and yields lighter instruments. When I asked about this timber, about why it is used to build instruments, the late Cirilo Promotor Decena, an award-winning Tlacotalpan luthier, ⁵ said:

My guitar is made of cedar.

Cedar is an old wood, ancient ...red. It's cedar, I swear!

Because the music that gives sound is cedar... The best there has ever been for instruments, for the guitar and jarana, is cedar.

Cedarl Cedar is a fine wood. It's the finest wood there is cedar.

Cedar! Cedar is a fine wood. It's the finest wood there is, cedar. It's beautiful.

(Promotor Decena, 2018).

An aesthetics of cedar shines through Promotor's testimony. 'It's beautiful'. It has to do with its colour (red), its aural properties (the music that gives sound is cedar), the quality of the wood (the finest there is), and its history (old, ancient). It is precisely in history that this aesthetics originates, as we see in the testimony of Ramón Gutiérrez Hernández, Sotaventine luthier and guitar virtuoso from the group Son de Madera:

[Cedar] gives the instrument a very special sound. I mean, why do they use spruce [Picea abies] to build violins? Well, because it's what was usually nearby, and what they started using — it's the sonority that the instrument has forged.

One could use other tonewoods, but because of tradition one grows accustomed to *that* being the sound of the instrument, and it's a very beautiful sound, isn't it?

A well-made instrument, particularly a [Sotaventine] guitar, can have a unique sound...That's why I say that wood has a function, perhaps it wasn't deliberate at first, but because of everydayness and the luthiery tradition, we all use cedar, because that's the sound we're after...it's the learnt sonority that you know the material will yield.

(Gutiérrez Hernández, 2018)

This learnt sonority is the result of the use of cedar in Sotaventine

⁵ Cirilo Promotor Decena received the *Premio Nacional de Ciencias y Artes* granted by the Mexican government for his work as a luthier in 2009.



Fig. 3. Taconazo. Tlacotalpan, August 2018.

luthiery throughout the longue durée. It is a local timber used by local woodworkers to build both boats and chordophones. This phenomenological kinship permeates cedar with meaning. We can further develop this phenomenology of cedar with two theoretical concepts: Foucault's heterotopias and Gilroy's Black Atlantic ships. These two concepts provide us with phenomenological principles which we can use as scaffolding for a phenomenology of chordophones that counterpoints the hydrocolonial navigations of early modern capitalism.

4. Ships and other spaces

Foucauldian theory provides us with a phenomenology of ships. Foucault speaks of 'other spaces' — heterotopias — which are a 'simultaneously mythic and real contestation of the space in which we live' (Foucault and Miskowiec 2012: 24). To him 'the ship is the heterotopia par excellence' it is 'a floating piece of space, a place without a place, that exists by itself, that is closed in on itself and at the same time is given over to the infinity of the sea' (Ibid.:24, 27).

The concept of heterotopia has been widely used in the past to discuss different spaces, from magic carpets to prisons to parks (Johnson 2013). It encompasses a macro or microcosm in which there is space for the utopic within the real world. Nevertheless, and in spite of Foucault's other radical theories, the heterotopia — at least its first iteration — betrays a colonial, European, structuralist gaze, as Saldanha points out (2008). The ship that Foucault imagines as his archetypal heterotopia is the ship which 'goes as far as the colonies in search of the most precious treasures they conceal in their gardens' (Foucault and Miskowiec 2012:27); it is the hydrocolonial ship. This description with the colonies, and the 'most precious treasures they conceal', exposes an underlying imperial violence that is inherent to the hydrocolonial ship and the processes in which people were trafficked, tortured, and murdered in search for 'precious treasures'. Foucault's heterotopic ship is like the

Spanish Armada's, built from materials extracted from the colony to further mercantilist exploration and exploitation. There is also an orientalism here that is seldom discussed — perhaps unsurprising, considering the concept arose, at least partly, form Foucault's Tunisian sojourns (Saldanha 2008: 2081; Faubion 2008: 31). Furthermore, aboard the heterotopic ship sail pirates — while in Modern minds, the pirate is seen as a romantic hero or adventurer (and this seems to be the case for the Foucauldian pirate), in reality, many pirates were part of colonial mercantilism, trading illegally in trafficked human beings and various commodities. 6

The heterotopia of the boat is not that of the Sotaventine canoe, but of the transatlantic ship, taking cedarwood and other American commodities to Europe. In fact, the Foucauldian ship sails 'from the sixteenth century until the present' (Foucault and Miskowiec 2012:27); it is a paragon of hydrocolonialism. The purpose of this ship is to explore, conquer, commoditise, and enslave. These heterotopic navigations are not utopic in the least; they are like Glissant's 'arrowlike nomadism', where relation is enacted as a violent expansion of empire (2010: 12).

But the ship is not just a hydrocolonial heterotopia, it is also a 'living, micro-cultural, micro-political system in motion' (Gilroy 2022:4). To Gilroy, the ship is one of the central images of the Black Atlantic. Ships are 'cultural and political units rather than abstract embodiments of the triangular trade' they provide 'a means to conduct political dissent and possibly a distinct mode of cultural production' (Ibid.:17). The ship then is a paragon of hydrocoloniality and the foundation of racial capitalism, but it is also the means of resistance to imperial totality. Ships represent

⁶ It is worth mentioning that slave trade was considered piracy, not because kidnapping and trafficking humans was illegal, but because pirates did it without the relevant permits, as was the case with Sir Francis Drake and Sir John Hawkins in their American voyages (de Ita Rubio, 2001).

'the unruly force of rivers and oceans as well as the distinctive habits, peregrinations and insubordinate mentalities of those who worked upon the waters' (Gilroy 2018:9). This double meaning of the ship should not surprise us, for, though it may seem contradictory, it is not unexpected, as Glissant wrote: 'Totality's imaginary allows the detours that lead away from anything totalitarian' (2010:18).

When we think of harps and other chordophones as if they were boats, they become instruments of hydric inhabitation. This phenomenological kinship allows us to think of musical instruments as a space in and of themselves. Furthermore, it allows us to follow Gilroy's ships and think of instruments as cultural and political microcosms embedded in a complex Atlantic history, counterpointing, deconstructing, and decolonising the heterotopia. Moving forward with a decolonial heterotopic framework (without dismissing the hydrocolonial issues that arise from the original heterotopia), if we agree with Foucault in that 'the ship is the greatest reserve of the imagination', and that 'without boats, dreams dry up' (Foucault and Miskowiec 2012:27), then what would this mean for the harp and the jarana? Are they not oneiric places even more enclosed in themselves than the explorers' ship could ever be? Do we not pour out all they contain each time we pluck their strings? They are built the same way as boats, with the same woods, and — in the case of Taconazo's instruments — by the same man. Imagination materializes and travels in these cedar bodies better than in imagined hydrocolonial ships. Chordophones make space for the utopic, they are the material form of 'utopian possibilities, the "not-yet" that...musical formations helped to construct, enact and make seductive and pleasing' (Gilroy 2021: 117).

With these thoughts in mind let us consider another case that strengthens the argument behind the kinship of ships and soundboxes, and in which the colonial history that entangles with our wooden phenomenologies is further elucidated: the case of the European violin.

5. Botanic colonialism: exploração, violin bows, and musical aesthetics

Like cedar in Sotaventine luthiery, timbers used in the construction of European violins have a history from which aural-material aesthetics emerge. The case of European violins has been explored by Allen (2012b) who considers the history of the forests in the Val di Fiemme, where the spruce (*P. abies*) used by Stradivari grew. Allen surveys the history of this forest alongside the mercantile and political relations that led to its survival. Like Sotaventine cedar, spruce was used in both the construction of violins and ships; and, like cedar in Sotaventine luthiery, Val di Fiemme spruce has garnered near-mythical values among Western luthiers, becoming 'the fundamental material for constructing the quality musical instruments central to the sound of Western music' (Ibid:301).

Allen compares the history of spruce with 'the well-known modern story of another musical wood' (Ibid.:302), pernambuco (*Paubrasilia echinata*, also known as brazilwood, *pau-brasil* or *ibirapitanga*). This timber, used in bows for European stringed instruments, has a colonial history that that led to the depletion of Brazil's Mata Atlântica. The history of *pau-brasil* has deep implications, as it gives us an insight into how colonial commodities were linked to knowledge production and how they led to the development of our musical aesthetics.

5.1. Exploring pau-brasil

Ibirapitanga was the first species commoditized by Portuguese navigators upon their arrival in the coast of Pindorama. They returned to Lisbon with ships filled with *pau-brasil* heartwood, which was used as a red/purple dye and would become the most important export of the region throughout the 16th century, giving this land its colonial name — Brazil (McNeill 1986; Dodge 2018). *Pau-brasil* was immediately declared to be property of the Portuguese crown and the monopoly contract for its exploitation was given in 1502 to a Lisboner merchant who, along the

extraction of brazilwood, was charged with the exploration of 300 leagues of Brazilian littoral each year, as well as building and keeping a fort (Dodge 2018:5). Here, like with del Corral's surveys, botanic resources, geographical knowledge, and military endeavours came together; the exploitation of pernambuco and the exploration and domination of Brazil's Atlantic shores intertwined. It is no surprise that the Portuguese word for exploration and exploitation is one and the same: exploração. The unicity of exploration and exploitation, and the closeness of this exploração with geographical and biological knowledge production are a sign of a coloniality of knowledge. As Saldanha notes, during early Modernity the production of scientific knowledge was part of colonial projects, 'the delineation of Europe as ahead of everyone else was buttressed...through the scientific gaze and visual technologies such as maps' (2010: 75). This 'creation of the Eurocentric perspective of knowledge' was accompanied by 'the theoretical elaboration of the idea of race as naturalization of those colonial relations of domination' (Quijano, 2000a: 203).

We see the colonial relations of domination in the way Indigenous workers are represented in European colonial maps (de Siqueira 2011; Dodge 2018; Rocha et al., 2007). The Carta do brasil, from Lopo Homem's Atlas Miller, depicts the peoples of Pindorama naked in the forest, among monkeys, parrots, and dragons, cutting brazilwood (see Fig. 4). They are described as 'dark in colour. Savage and very cruel, they eat human flesh. These people are the most skilled in the use of bows and arrows'. The map goes on: 'Here there are parrots of many colours, and other innumerable birds and beastly wild monsters. And may types of monkeys...and the tree called brasil grows in large quantities, which is proper to dye fabrics purple' (Polo Martín, 2016: 5). The map shows how 'specimen-being and exoticism were from the beginning harbingers of capitalist exchange' (Saldanha 2010:77), as we see the production of scientific knowledge alongside monstrous imaginations and the beginnings of racial capitalism in this region.

Maps cannibalised the diverse peoples of Abya Yala, in two ways. First, whatever their actual foodstuffs, through the scientific gaze Indigenous and Afro populations were turned into cannibals, as Jáuregui puts it, in the map 'the Other[s]...become savage cannibals that threaten with their omnomnom' (2008:467). The image of the cannibal allowed for American bodies to be cannibalised again, devoured by "cannibal capitalism" (Ibid:564); they were displaced, exploited, and killed in search for profit by the colonial explorações. This process of othering was part of Western knowledge production, and rests upon the dualism of reason and nature, where '[t]he subject is the bearer of reason, while the "object" is not only external to it, but different nature. In fact, it is "nature" (Quijano 2007: 172-173). While in Lopo Homem's map the American Other is seen as part of nature, European explorers appear as ships, criss-crossing the Atlantic under Portugal's red-and-blue flag. Ironically the "subject" of knowledge production appears as an object the hydrocolonial ship — while the "objects" are shown as people cutting wood. Nevertheless, this apparent irony responds to the coloniality of knowledge of the exploração: in Euro-Western Modernity, the 'body' is separated from reason, that is, the body is not part of a rational subject (Quijano 2000b: 221). No matter how much the colonial ship is romanticised as a space of dreams and imagination, the hydrocolonial vessel is the material representation and means of Euro-Western explorações; while the deceivingly human-looking Indigenous peoples are part of a "vicious" nature. In Gilroy's words, here is 'an encounter between two ecologies, the first laid over the second by the emergence of hydrarchy and Europe's emergent planetary consciousness' (2021:114).

The construction of Modernity and of Euro-Western knowledge developed not only through the creation of a racist imaginary and epistemology, but also through the trade of material goods — the heterotopic treasures — linked to the exploitation of racialised peoples. The *exploração* of brasilwood, first relied upon Indigenous labour. Once the littoral forests were depleted of *pau-brasil* and the Indigenous peoples ceased to trade with the Portuguese, the colonists forced enslaved African workers to find, process, and transport pernambuco by river to the

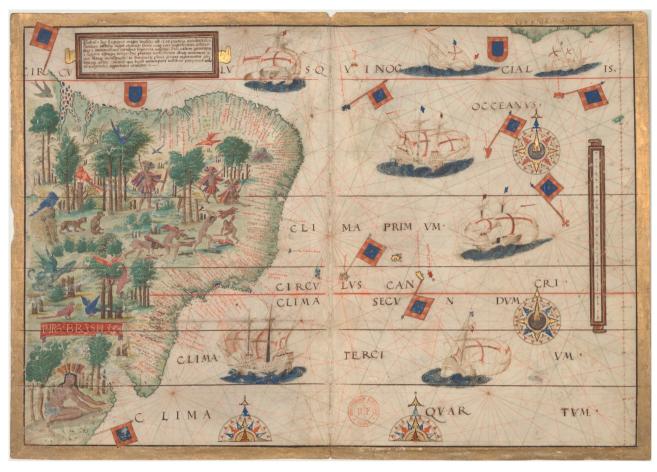


Fig. 4. "Terra Brasilis" from Lopo Homem's Atlas Miller.

coast. From there, the timber would be shipped to the metropolis, alongside sugar, coffee and other plantation products (Dodge 2018). Although these new plantation products would overtake pernambuco as the centre of Brazilian economy, this timber remained a Brazilian commodity well into the 19th century. We see this in the illegal trade of *pau-brasil* undertaken by French and Dutch pirates throughout the 17th and 18th centuries (de Siqueira 2011; Dodge 2018).

Like cedar in colonial Sotavento, the exploitation of *pau-brasil* is enmeshed in a complex network of racial capitalism, colonial trade, transatlantic voyages, and explorations — military, biological, and geographical. We could tie up this entanglement in the term $explorac\bar{c}o$; an exploration/exploitation, or exploration if you're into portmanteaus. Taking this further, we could see in pernambuco wood itself a metonym of the hydrocolonial $explorac\bar{c}o$: brazilwood is the product of $explorac\bar{c}o$ s, be they those of the merchant, the cartographer, or of the pirate — though all these characters are more-or-less the same when seen from an American perspective. This $explorac\bar{c}o$ is intertwined with the history of spruce that Allen explores (2012b).

The bow, with its materiality, values, and aesthetics, is part of this history of colonial *explorações*. The presence of pernambuco in an 18th century French luthier's workshop is the result of trade enabled by hydrocolonialism and transatlantic slavery, and the archetier's experiments are reflection and consequence of these bio-geo-militaristic colonial *explorações*. Pernambuco bows and their sound are the result

of this history, as much as of the history of the Val di Fiemme. So are the ecological anxieties posed by the exploitation of *ibirapitanga* in the Anthropocene. In the end, this hydrocolonial history is, borrowing Allen's words 'central to the sound of Western music' (2012b:301).

Pernambuco and its musical aesthetics are both result and metaphor of hydrocolonial navigations; while this contrasts with the topophilic use of cedar in Sotaventine luthiery, we can also see instances of $explora c ilde{a} ilde{a}$ in colonial surveys of the Papaloapan and in the trade of cedar wood. The imperial and the topophilic come together in the aural, poetic and material aesthetics of music.

6. Empire, topophilia, and poetic navigations

When counterpointing Sotaventine and European musics we see two distinct navigational archetypes with two different aesthetics. On the one hand we have the hydrocolonial, with the ships that take precious timbers and treasures, violently obtained, as merchandise to be consumed in the Empire's metropolis. On the other hand, we have the topophilic. Topophilia in the Black Atlantic is complex, it emerges from inhabiting the immediate — from everyday experiences, and from local histories — while being enmeshed in imperial networks. This topophilia challenges the totality of empire from the colonial shores of the Black Atlantic and its many navigations.

While Leeward instruments' origins lie in the Spanish Baroque (García Ranz 2010), they are the result of inhabitating Sotaventine waters and woods. The violin itself, which might seem a paragon of imperialism after considering *pau-brasil*, has been adopted and adapted by Sotaventine luthiers, who carve fiddles from blocks of cedar wood. Sotaventine violins have *chagani* (*P. dimorphandrum*) bridges, fingerboards and tuning pegs; their tailpiece and nut (sometimes the bridge as

Whose bow? The cannibal's, the luthier's or the musician's? They all come from the same forest, though they're made of different materials and elicit different reactions. Perhaps another phenomenological clade can be traced linking chordophones and bows, if not through the skill and material used, by their shape and geographic origins.

well) are made of bullhorn, and the bow's hair comes from local horses — both animals, albeit originally from the "Old World", are central to Sotaventine landscapes and economy. Even the rosin used in the bow is sometimes *Bursera simaruba* resin, burnt in some rituals as an incense, rather than the usual conifer-derived rosin. The use of these materials comes from a long history of inhabitation, as Dr. Héctor Luis Campos, a local historian, veterinarian, and luthier expressed to me when explaining his choice of timbers for a fiddle. The use of these woods, he says, comes from a sense of responsibility, from a connection to the land and a sense of accountability to his ancestors who inhabited the land.

Besides materials and techniques, the question of standardisation or lack thereof in the case of Sotaventine instruments — speaks of a resistance to colonial ways of knowing inherent to the exploração. While coloniality of knowledge and global trade demand neatly defined categories and repeatable results — as can be seen in the standardised sizes and shapes of many Western instruments now often mass-produced — a clear categorisation of Sotaventine instruments is almost impossible. Sizes, shapes, strings and tunings are diverse, changing from one place to another, from one luthier to the next. The material poetics of Sotaventine luthiers — the literal poiesis, the making of the instruments – speaks of instruments as heterotopias of the Black Atlantic, unruly and insubordinate, stemming from historic and personal experiences of inhabiting Sotavento, and from skills garnered through this inhabitation. The testimony of a son Jarocho musician in Paris points to this sense of topophilia; he told me of how hard it was to get instruments in France, since it is a long way away from Sotavento.

"Aren't there any luthiers here?"

I asked

"Well, yeah, there are some "proper" luthiers who've studied in Cremona and all those fancy places, they have the technical know-how to build instruments and all that. But they couldn't build a jarana. It wouldn't sound right."

Sotavento gives instruments' bodies and sounds an aesthetic that cannot be easily imitated. The region's forests and water flows inspire Sotaventine wooden poetics 'and the carpenters / dream of long guitars / through forests of old /mahogany and cedar', ⁸ as we hear in the verses of Patricio Hidalgo, acclaimed Sotaventine poet, musician, and luthier (Hidalgo Belli and Son de Madera, 2009). Or as Taconazo said when speaking of his trade as riverside carpenter:

"I'd still dare to build a boat, because I built so many. So many." $\,$

6.1. Towards a decolonial hydropoetics

Leeward luthiery speaks of a decolonial hydropoetics. Decolonial because it resists the urges of coloniality, and hydropoetic because it echoes the making of things for water life. Hydropoetics are our stories and ways of inhabiting water (Bernal Arias and Marandola 2018). Hydropoetics are engrained in cedarwood, as well as in the sounds and verses this material brings forth. The kinship of ships and soundboxes comes together in carpenters' memories, in wood or in verse. The proliferation of verses speaking of navigations in son Jarocho echo Heidegger's refrain taken from Hölderlin that 'full of merit, yet poetically, man dwells on this earth' (Heidegger 2000: 113). Or, in this case, on the waters. Across son we hear of transatlantic ships and of the everydayness of sailing. In *La Bamba* a conversation ensues:

Dime niña bonita ¿quién te mantiene? Los navíos de España que van y vienen (Tell me beautiful girl, / who pays your bills? / It is the ships of Spain / that come and go). In another verse we hear that.

De Veracruz llegaron, rompiendo el agua, a la Torre del Oro barcos de plata

(From Veracruz arrived, / breaking the water, / to the tower of gold / the silver ships.) (García de León 2009:63), likely referencing the Torre del Oro in Seville which received colonial treasures before Cádiz became the Spanish Empire's main metropolitan port.

Transatlantic voyages emerge from cedar chordophones time and again. In $El\ Balaj\acute{u}$ — a son referencing either a transatlantic warrior, a swordfish, a smuggler's vessel, or all three — the singer puts forth a challenge: '…let us set sail and let's see / who's the first one to arrive / in the far side of the sea'. ⁹ This tune further speaks of navigations as it tells of sailors' daydreams and reveries:

Ariles y más ariles, ariles del Barlovento, yo también fui marinero y navegué contra el viento.

(Daydreams, dreams, and reveries, / Windward reveries and dreams, / I too was a mariner / and I sailed against the wind). Hydropoetic verses remember hydrocolonial navigations present throughout the history of Sotavento. While this history is remembered, cedar-soled shoes strike the tarima, bringing forth other poetic images of the sea. A verse in Son de Madera's *El Amanecer* begins with this oceanic image of the percussive instrument: 'Te declaro un zapateo / sobre el mar de la tarima...' (I declare a dance for you / over the tarima's sea...) (Son de Madera, 1997). Is the dancer then also a mariner?

Other verses, like these refrains from *El Fandanguito*, evoke a history of everyday hydropoetics, of rowing boats and bongos used in Sotaventine rivers:

A remar, a remar en el río que aquel que no rema no gana navío. A remar, a remar, marinero que aquel que no rema no gana dinero

(Off to row, off to row in the river / for those who don't row / won't win any ships...Off to row, off to row mariner / for those who don't row / won't earn any money). Similarly, sones like *El Coco*, which speaks of ways of cooking a type of waterfowl ('They say the coco's real tasty / when you cook it with fine herbs...'10), is said to have been sung to keep rowers' tempo. This reminds us of the smaller vessels used to load and unload mercantile ships throughout the colonial period, as does another of its verses:

The ships are all standing still because the south winds won't blow and that's why we haven't had ships coming into the Port. ¹¹

Are these hydropoetics topophilic or hydrocolonial? Is the jarana another heterotopia enshrining colonial narratives? Verses and tunes seemingly exalting hydrocolonial navigations are present in the most

⁸ '...y los carpinteros / sueñan tercerolas / por el monte viejo / de cedro y caoba'.

^{9 &#}x27;...vámonos a navegar / a ver quién llega primero / al otro lado del mar'.

 $^{^{10}\,}$ 'Dicen que el coco es muy bueno / guisa'o con especia fina...'.

 $^{^{11}}$ 'Los barcos están varados / porque no les sopla el sur, / y por eso no han entrado / barquitos a Veracruz'.

traditional Sotaventine fandangos.

The mariner poetics of son seem to further echo Heidegger's analyses of Hölderlin's *Remembrance*. In Hölderlin's hydric poem "The northeast blows, / Of winds the dearest / ...And a good voyage it promises to mariners'. From this, Heidegger declares that "The *mariners* are Germania's coming *poets*." (2000:111), claiming that 'the poets must first be *mariners*' (Ibid:118). The mariner-poet voyages to alterity, to "the colony", the mariner-poet does this 'purely for the sake of becoming at home in what is one's own, [this] is the essential law of destiny by which the poet is sent into the foundation of the history of the "fatherland" (Ibid:112). But this is a hydrocolonial poetics. As Fanon puts it 'the history which he writes is not the history of the country which he plunders but the history of his own nation in regard to all that she skims off, all that she violates and starves' (1969: 40).

The Jarocho singer cries out verses speaking of Spain, recalling the times of Empire, but Jarocho mariners are not like Germania's coming poets, they don't seek 'the history of the fatherland', whenever or wherever that may be. Sotaventine poets seem almost reluctant to undertake the mariner's endeavour. A Sotaventine verse sung in *La Petenera* or *El Balajú* shows an open disdain for sailing:

Cuando el marinero mira la borrasca por el cielo alza la vista y suspira y le dice al compañero: "¡Si Dios me presta la vida no vuelvo a ser marinero!"

(When the mariner looks up / and sees the clouds in the sky / he lifts his eyes in a sigh / and says to his nearest friend / if God grants me enough life / I won't be a sailor again!). Another verse grounds the navigational-poetic endeavours in the everyday as the singer advises a fisherman: '...point your prow to the lagoon / if you can't catch any shrimp /at least you'll bring back the moon / you'll bring the moon in your ship'. 12

Sotaventine sailors sail in their own waters, and when they sail the routes of empire, it is often because they are forced to do so. We hear this in *El Fandanguito*:

Pues a la ela,
más a la ela,
golpe de mar,
barquito de vela,
dile a mi bien
adónde me llevas. 13
Si para España
o para otras tierras.
¿o a navegar
al mar para afuera?

(Well, to the lee / and more to the lee, / crash of the waves / little sailing ship / say to my love / where you're taking me. / If off to Spain /or elsewhere. Is it / to sail away, / out into the sea?). In this verse some hear a sailor yearning for their loved one, others a conscripted mariner, others the voices of trafficked humans, imprisoned in the hull of the ship. Be as it may, the poetics of son speak of a complex notion of the ship.

While the Foucauldian pirate or the Heideggerian poet sail eagerly in search of treasure, seeking glory for their fatherland, the Sotaventine singer declares "yo no soy marinero". I am no mariner. We hear it in Taconazo's voice (track 1). The Jarocho mariner recants

hydrocoloniality and knows nothing of "winds the dearest"; Sotaventine mariners sail against the wind, like we hear in *El Balajú*. Sotaventine sailors don't seek glory, but a payday, or deliverance, or love, or perhaps shrimp. The Sotaventine dancer-poet is the mariner of the Black Atlantic; Sotaventine mariners are reluctant 'sailors moving to and fro between nations, crossing borders in modern machines that were themselves micro-systems of linguistic and political hybridity' (2022:12). They don't look for alterity for the sake of self, the notion of the fatherland is not proper for this poetics, since the 'poetics of the black Atlantic... counterpose... narrow nationalism' (Ibid.). While Sotaventine hydropoetics are poetics of the hydrocolonial world, their enunciation comes not from colonial power but from cedarwood guitars.

Cedar and its sounds counterpoint the narratives that see the colony as the means by which glory and riches are obtained. The material bodies of jaranas and guitars, rather than hydrocolonial ships, provide the means for these decolonial mariner poetics. Euro-Western instruments do not provide this same possibility — at least not in terms of their materiality — since the timbers and materials used in their construction are, more often than not, the result of colonial *explorações* and their poetics. Hydrocolonial materiality is the product of exoticisation, not topophilia since 'no one can feel affection for a vast system of impersonal power like empire' (Tuan 1990:101). Through cedar chordophone-ships comes a counterpoint that centres the experience of living in the edges of empire and that resists the commoditisation of life. And yet coloniality remains.

7. Ships and soundboxes in the Anthropocene

Though the vessels that transport them are no longer made of wood, tropical American timbers are still embedded in global commerce, echoing the trade of colonial *explorações*. Nowadays the trade of American cedarwoods (*Cedrela* spp.) is restricted by Appendix II of CITES, meaning that although it is 'not necessarily now threatened with extinction [it] may become so unless trade is closely controlled' (CITES 2019: 68). This speaks of an Anthropocenic reality which affects not only trade but music and luthiery (*Gibson* and *Warren* 2016, 2020).

The history of tonewoods is relevant in this context, and it echoes in the praxis of luthiers. Hydrocolonial *explorações* are still present in the materiality and sound of diverse musical instruments, particularly in Euro-Western luthieries. Wooden instruments are filled with phenomenological values accrued over the longue durée which, in the case of son, come from their kinship with watercraft, and with everyday local practices. These values result from and counterpoint the *exploração* in which the production of biological, geographical and anthropological knowledge is entangled with racial capitalism, militarism, ecological destruction, and the production of Euro-Western aesthetics. These rigid systems of knowledge are counterpointed by circumpelagic musics and poetics.

While material culture is the result (and receptacle) of complex racial and colonial histories, this is something that is seldom acknowledged. Other than Gibson and Warren's works on tonewoods and guitars or Martínez-Reyes' work on mahogany (Martínez-Reyes 2015, 2021; Gibson and Warren 2016, 2018, 2020, 2021), the impact of colonial histories in the materiality and aesthetics of music remains in the fringes of geography and ecomusicology. Understanding the colonial history of timber trade and of musical aesthetics is important not only because of what this entails for musicians and luthiers, but because it also informs our understanding of current trends in the trade of tropical woods and the production of musical instruments. This is particularly pertinent in a context where resource scarcity is cause for concern both for large companies and small luthiers (Gibson and Warren 2016, 2020). Understanding the coloniality inherent to the supply of tonewoods and other musical materials will be crucial for music-makers and instrumentbuilders in the Anthropocene.

The coloniality of musical materials and their aural aesthetics undoubtedly has numerous political implications today — from questions

^{12 &#}x27;...pon la proa a la laguna / que si no traes camarón / traerás siquiera la luna / metida en la embarcación'.

¹³ Though sometimes sung as 'dime mi bien, / λ adónde me llevas?' (tell me my love / where're you taking me?) the point remains.

of environmental justice related to resource extraction, to practical aspects of instrument-building, to the aesthetics (particularly the material aesthetics) of different musical traditions — however, these are issues beyond the scope of this work. Nevertheless, these are topics worth exploring, considering the heterogeneous realities experienced by music companies and millenary musical traditions that coexist with each other and with numerous ravenous industries in a global Anthropocenic landscape that is also the result of colonial *explorações*, and where different materials are becoming increasingly scarce.

The topophilia of music cultures and the phenomenology of their instruments in relation to colonial histories is something to be considered further in Sotavento and beyond. This approach can be used in other places of the Black Atlantic world, like West Africa where hardwoods like *kéno* (*Pterocarpus erinaceus*) — with many uses, including as a red dye — are used to build koras, djembes, and balaphones (Gourlay and Durán 2001; Knight 2001). Or in Andalucía, where flamenco shoes and guitars, once built with local cypress, are now constructed of imported tropical rosewoods (Applegate 2021).

We can explore matters of topophilia and hydrocolonialism in further musical shores, like the case of guitars and ukuleles in Hawai'i made of *koa* from Pasifika forests (*Acacia koa*) — interestingly, this species was also used, and highly appreciated, in the construction of canoes and surf boards as noted by Gibson (2019). We can even go inland with materials like mulberry wood (*Morus* alba) which is used in West Asian instruments like Persian tars and setars, and Turkish saz (Bates, 2012; Pourtahmasi and Se Golpayegani, 2009), and which provides the material-ecological basis for silk production.

This decolonial material approach to the Black Atlantic can also enter into conversation with other musical practices entangled with other hydrocolonial histories as is the case of Marshallese music (Schwartz, 2019). Engaging with Pasifika musics and music scholars is particularly relevant since this is the origin of many pelagic theories (Te Punga Somerville 2017), and given that other inhabited seas and other hydropoetics can help us better understand our relationship with water — an urgent matter considering current climatic anxieties over rising sea levels and traumatic experiences of already occurring hurricanes, floods, and droughts. Whether on the shores of the Black Atlantic or beyond, the case of son Jarocho outlines a way to trace post/decolonial histories of musical matters that are entangled within global networks of trade resulting from the same processes that have given rise to the Anthropocene.

CRediT authorship contribution statement

Diego Astorga de Ita: Writing – review & editing, Writing – original draft, Methodology, Investigation, Funding acquisition, Formal analysis, Data curation, Conceptualization.

Funding

This work was supported by the Mexican Council of Science and Technology (CONACYT) through their Scholarships for Postgraduate Studies; and by the IJURR Foundation through a Writing Up Grant.

Acknowledgements

I'm thankful to all the luthiers and musicians who took the time to talk to me during my stay in Sotavento. I would particularly like to thank Mario Cruz for encouraging me to meet Taconazo and for his hospitality in Tlacotalpan. I'm also thankful to Prof. Mike Crang and Prof. Gavin Bridge for reading and commenting an earlier version of this text. Lastly, thanks to both funders, CONACYT and the IJURR Foundation, for supporting my research.

Appendix A. Supplementary material

Supplementary data to this article can be found online at https://doi.org/10.1016/j.geoforum.2024.104156.

Data availability

The data is not shared but some may be made available upon request.

References

- Allen, A.S., 2011. Prospects and problems for ecomusicology in confronting a crisis of culture. J. Am. Musicol. Soc. 64 (2), 414–424. https://doi.org/10.1525/iams 2011 64 2 414
- Allen, A.S., 2012a. Ecomusicology: music, culture, nature and change in environmental studies? J. Environ. Studies Sci. 192–201. https://doi.org/10.1007/s13412-012-00721
- Hidalgo Belli, P., Son de Madera. 2009. Jarabe Loco (Crazy Dance). In: Son de Mi Tierra [CD] (5:06 mins. Smithsonian Folkways Recordings).
- Allen, Aaron S. 2012. "Fatto Di Fiemme": Stradivari's Violins and the Musical Trees of the Paneveggio. in *Invaluable Trees: Cultures of Nature 1660-1830*, ed. by Laura Auricchio, Elizabeth Heckendorn Cook, and Giulia Pacini (Oxford: Voltaire Foundation), мсссхххи, pp. 301–16.
- Anderson, B., 2004. Recorded music and practices of remembering. Social Cultural Geography 5 (1), 3–20. https://doi.org/10.1080/1464936042000181281.
- Anderson, B., Morton, F., Revill, G., 2005. Practices of music and sound. Social Cultural Geography 6 (5), 639–644.
- Applegate, B. C., 2021. Rise and fall of iconic guitar tonewoods and evaluation of alternative species. (PhD Thesis, University of Edinburgh). doi: 10.7488/era/1695.
- Bates, E., 2012. The social life of musical instruments. Ethnomusicology 56 (1895), 363–395. https://doi.org/10.5406/ethnomusicology.56.3.0363.
- Bernal Arias, D.A., Marandola, E., 2018. Presença-Ausência da Água na Cidade:
 Narrações Hidropoéticas no Habitar Urbano Contemporâneo. Ateliê Geográfico 12
 (2), 98–113. https://doi.org/10.5216/ag.v12i2.45807.
- (2), 98–113. https://doi.org/10.5216/ag.v12i2.45807.
 Bystrom, K., Hofmeyr, I., 2017. Oceanic routes: (Post-It) notes on hydro-colonialism.
 Comparative Literature 69 (1), 1–6. https://doi.org/10.1215/00104124-3794549.
- Carney, G., 1974. Bluegrass grows all around: the spatial dimensions of a country music style. J. Geography 73 (4), 34–55.
- Carney, G., 1998. Music geography. J. Cultural Geography 18 (1), 1–10. https://doi.org/ 10.1080/08873639809478309.
- Chaunu, P., 1960. Veracruz En La Segunda Mitad Del Siglo Xvi y Primera Del Xvii. Historia Mexicana, 9.4 (El Colegio De, Mexico, pp. 521–557. http://www.jstor.org/stable/25135022.
- CITES. 2019. Convention on International Trade in Endangered Species of Wild Fauna and Flora. Appendices I, II and III Valid from 26 November 2019. https://cites.org/sites/default/files/eng/app/2019/E-Appendices-2019-11-26.pdf.
- Cohen, S., 1995. Sounding out the city: music and the sensuous production of place.

 Trans. Inst. British Geograph. 20 (4), 434–446. https://doi.org/10.2307/622974
- Connell, J., Gibson, C., 2004. World music: deterritorializing place and identity. Prog. Human Geography 28 (3), 342–361. https://doi.org/10.1191/0309132504ph4930a
- Dawe, K., 2003. Lyres and the body politic: studying musical instruments in the cretan musical landscape. Popular Music and Society 26 (3), 263–283. https://doi.org/ 10.1080/0300776032000116950.
- Dawe, K., 2004. "Power.Geometry" in Motion: Space, Place and Gender in the Lyra Music of Crete. In: Whiteley, S., Bennet, A., Hawkins, S. (Eds.), Music, Space and Place: Popular Music and Cultural Identity. Aldershot: Ashgate Publishing Limited, pp. 55–65.
- Daynes, S., 2004. The Musical Construction of the Diaspora: The Case of Reggae and Rastafari. In: Music, Space and Place: Popular Music and Cultural Identity. Aldershot: Ashgate Publishing Limited, pp. 25–41.
- de Ita Rubio, L., 2001. Viajeros Isabelinos En La Nueva España. México D.F.: Fondo de Cultura Económica.
- de Siqueira, M.I., 2011. Considerações Sobre Ordem Em Colônias: As Legislações Na Exploração Do Pau-Brasil. *CLIO: Revista de Pesquisa*. Histórica 29 (1).
- Exploração Do Pau-Brasil. *CLIO*: *Revista de Pesquisa*. Histórica 29 (1). Son de Madera. 1997. El Amanecer. in *Son de Madera* [*CD*] (9:23 mins. Urtext).
- del Corral, M., de Aranda, J. 1777a. Mapa de La Porción de Territorio Correspondiente a La Cuenca Baja Del Río Papaloapan, Desde Tlacotalpan Hasta Su Desembocadura En La Barra de Alvarado, En El Golfo de México. *Archivo General de Indias*, p. ES.41091. AGI//MP-MEXICO.330.
- del Corral, M., de Aranda, J.. 1777b. Mapa de Parte Del Istmo de Tehuantepec, Entre El Seno Mexicano y El Mar Del Sur, Por El Ingeniero Miguel Del Corral y El Capitán de Fragata Joaquín de Aranda. Archivo General de Indias, p. ES.41091.AGI//MP-MEXICO,329.
- Dodge, C.J.G., 2018. A forgotten century of Brazilwood: the Brazilwood trade from the mid-sixteenth to mid-seventeenth century. E-J. Portuguese History 16 (1), 1–27. https://doi.org/10.7301/Z0VH5MBT.
- del Corral, M., 1782. Plano Que Comprehende Desde La Barra de Alvarado a La Ysla y Pueblo de Tlacotalpan y Entrada de Los Ríos de Cosamaloapan y de El Zapotal, En El Que Se Comprehende El Son[Deo] Que Fue En t[Ie]Mpo de Aguas En Pies de Vara Castellana. Archivo General de Indias, p. ES.41091.AGI//MP-MEXICO,385.
- Domínguez Pérez, O., 2015. El Correo Del Sotavento: Una Mirada a La Cuenca Del Papaloapan. In: La Fuente Hemerográfica En La Diacronía: Variedad de Enfoques by (Eds.) María Fernanda García de los Arcos, Teresita Quiroz Ávila, Edelmira Ramírez

- Leyva, José Rivera Castro, Margarita Alegría Marcela Suárez Escobar and Others, 1st edn. UAM Azcapotzalco, México D.F., pp. 124–146. http://hdl.handle.net/11191
- Fanon, F.,1969. The Wretched of the Earth. Penguin Books Ltd., Middlesex.
- Faubion, J.D., 2008. Heterotopia: An Ecology. In: Heterotopia and the City by Michiel Dehaene and Lieven De Cauter (Eds.). Routledge (London &, New York, pp. 31–40. Foucault, M., Miskowiec, J., 2012. Of other spaces. Diacritics 16 (1), 22–27.
- García de León, A., 2004. Comercio de Balandra, Contrabando y Piratería En El Golfo de
- México. In: by Fernando Navarro Antolín (Ed.). Universidad de Huelva, pp. 181–188. García de León, A., 2009. Fandango. El Ritual Del Mundo Jarocho a Través de Los Siglos, 2nd edn. In: México, D.F. (Ed.), Consejo Nacional Para la Cultura y las Artes &
- Programa para el Desarrollo Cultural del Sotavento. García de León, A., 2014. *Tierra Adentro, Mar En Fuera. El Puerto de Veracruz y Su Litoral a Sotavento, 1519-1821*. Fondo de Cultura Económica y Universidad Veracruzana.
- México D.F. &, Xalapa García de León, A., 2002. El Mar de Los Deseos: El Caribe Hispano Musical: Historia y Contrapunto. Editorial Siglo XXI & Gobierno del Estado de Quintana Roo. México, D.
- Gibson, C., 2002. Rural transformation and cultural industries: popular music on the New South Wales Far North Coast. Australian Geographical Studies 40 (3), 337–356. https://doi.org/10.1111/1467-8470.00184.
- Gibson, C.R., 2019. A sound track to ecological crisis: tracing guitars all the way back to the tree. Popular Music 38 (2), 183–203.
- Gibson, C., Warren, A., 2018. Unintentional Path Dependence: Australian Guitar Manufacturing, Bunya Pine and Legacies of Forestry Decisions and Resource Stewardship. Australian Geographer, 49.1 (Taylor & Francis, pp. 61–80. https://doi. org/10.1080/00049182.2017.1336967.
- Gibson, C., Warren, A., 2016. Resource-sensitive global production networks: reconfigured geographies of timber and acoustic guitar manufacturing. Econ. Geography 92 (4), 430–454. https://doi.org/10.1080/00130095.2016.1178569.
- Gibson, C., Warren, A., 2020. Keeping time with trees: climate change, forest resources, and experimental relations with the future. Geoforum 108, 325–337.
- Gibson, C., Warren, A., 2021. The Guitar Tracing the Grain Back to the Tree, 1st edn. The University of Chicago Press, Chicago.
- Gilroy, P., 2018. Where Every Breeze Speaks of Courage and Liberty": Offshore Humanism and Marine Xenology, or, Racism and the Problem of Critique at Sea Level. In: Antipode, 50. John Wiley & Sons, Ltd, pp. 3–22. https://doi.org/10.1111/ ANTI 12333
- Gilroy, P., 2021. Antiracism, Blue Humanism and the Black Mediterranean. *Transition*, 132: 108–22. https://muse.jhu.edu/article/856593, [accessed 15 August 2024].
- Gilroy, P., 2022. The Black Atlantic: Modernity and Double Consciousness | Verso Books (London: Verso) [accessed 7 August 2024].
- Glissant, É., 2010. In: Poetics of Relation. University of Michigan, Ann Arbor.
- Gold, J.R., Revill, G., 2006. Gathering the voices of the people? cecil sharp, cultural hybridity, and the folk music of appalachia. GeoJournal 65 (1–2), 55–66. https:// doi.org/10.1007/s10708-006-0007-z.
- Gómez Cruz, M., 2018. Interview with Marco Gómez Cruz Taconazó. Tlacotalpan, Veracruz.
- Gourlay, K.A., Durán, L., 2001. Balo [Bala, Balafo, Balafou, Balafon]. The New Grove Dictionary of Musical Instruments. Oxford Music Online. https://doi.org/10.1093/ gmo/9781561592630.article.01914.
- Grimely, D.M., 2011. Music, landscape, attunement: listening to Sibelius's Tapiola. J. Am. Musicol. Soc. 64 (2), 394–398.
- Gutiérrez Hernández, R., 2018. Interview with Ramón Gutiérrez Hernández. Xalapa, Veracruz.
- Hancock-Barnett, C., 2012. Colonial resettlement and cultural resistance: the mbira music of Zimbabwe. Soc. Cult. Geography 13 (1), 11–27. https://doi.org/10.1080/ 14649365.2011.635799.
- Heidegger, M., 2000. Elucidations of Hölderlin's Poetry. Humanity Books, New York. Hofmeyr, I., 2019. Provisional notes on hydrocolonialism. English Language Notes 57
- (1), 11-20. https://doi.org/10.1215/00138282-7309644. Hudson, R., 2006. Regions and place: music, identity and place. Progress in Human
- Geography 30 (5), 626–634. https://doi.org/10.1177/0309132506070177.
- Jáuregui, C.A., 2008. Canibalia. Canibalismo, Calibanismo, Antropofagia Cultural y Consumo En América Latina, 1st edn. Iberoamericana, Madrid.
- Johnson, P., 2013. The geographies of heterotopia. Geography Compass 7 (11), 790–803. https://doi.org/10.1111/gec3.12079.
- Knight, Roderic C. 2001. Kora [Korro, Cora]. The New Grove Dictionary of Musical Instruments (Oxford Music Online). https://doi.org/10.1093/gmo/9781561592630. article.15371.
- Kruse, R., 2021. John Cage and nonrepresentational spaces of music. Social Cult. Geography 22 (6), 767–782. https://doi.org/10.1080/14649365.2019.1628291.
- Kuhlken, R., Sexton, R., 1991. The geography of zydeco music. J. Cult. Geography 12 (1), 27–38. https://doi.org/10.1080/08873639109478418.
- Leyshon, A., Matless, D., Revill, G., 1995. The Place of music. North 20 (4), 423–433. https://doi.org/10.2307/622973.
- Martínez-Reyes, J., 2015. Mahogany Intertwined: Enviromateriality between Mexico, Fiji, and the Gibson Les Paul. J. Mater. Cult. 20 (3), 313–329. https://doi.org/10.1177/1359183515594644.
- Polo Martín, B., 2016. El Reflejo de la Esclavitud en la Cartografia del Siglo XVI: La Carta de Lopo Homem. in XXI Coloquio de Historia Canario-Americana (2014) (Las Palmas de Gran Canaria: Cabildo de Gran Canaria), pp. 1–9.

Martínez-Reyes, J.E., 2016. Enviromateriality: Exploring the Links between Political Ecology and Material Culture Studies. in Routledge Handbook of Environmental Anthropology (Routledge), pp. 71–80. https://doi.org/10.4324/9781315768946-6.

- Martínez-Reyes, J. E. 2021. Timber to Timbre: Fijian Mahogany Plantations and Gibson Guitars. in Audible Infrastructures: Music, Sound, Media, ed. by Kyle Devine and Alexandrine Boudreault-Fournier (Oxford: Oxford University Press), pp. 93–116. Doi: 10.1093/oso/9780190932633.003.0005.
- McNeill, J.R., 1986. Agriculture, forests, and ecological history: Brazil, 1500–1984. Environmental Review:ER 10 (2), 122–133.
- Morton, F., 2005. Performing ethnography: irish traditional music sessions and new methodological spaces. Social and Cultural Geography 6 (5), 661–676. https://doi. org/10.1080/14649360500258294.
- Miranda Nieto, A., 2018. Musical Mobilities. Son Jarocho and the Circulation of Tradition Across Mexico and the United States, 1st edn. Routledge, New York.
- Pourtahmasi, K., Se Golpayegani, A., 2009. Introducing Mulberry's Wood (Morus Alba L.) Used in Bowl Shaped Musical Instruments of Iran. In: *Actes de La Journée Détude Le Bois.* Instrument Du Patrimoine Musical (Cité de la Musique, pp. 78–87.
- Pritchard, S.B., 2012. From hydroimperialism to hydrocapitalism: "French" Hydraulics in France, North Africa, and beyond. Social Studies Sci. 42 (4), 591–615. https://doi.org/10.1177/0306312712443018.
- Promotor Decena, C., 2018. *Interview with Cirilo Promotor Decena*. Tlacotalpan, Veracruz. Quijano, A., 2000b. Coloniality of power and eurocentrism in latinamerica. Int. Soc. 15 (2), 215–232.
- Quijano, A., 2007. Coloniality and modernity/rationality. Cult. Studies 21 (2–3), 168–178. https://doi.org/10.1080/09502380601164353.
- Quijano, A. 2000a. Colonialidad Del Poder, Eurocentrismo y América Latina. In: La Colonialidad Del Saber: Eurocentrismo y Ciencis Sociales. Perspectivas Latinoamericanas, ed. by Edgardo Lander (Buenos Aires: CLACSO), pp. 201–46.
- García Ranz, F., 2010. La Guitarra de Son Del Sotavento Mexicano. Organologia de Una Familia de Cuerda Punteada. Antropologia 90, 118–128. https://revistas.inah.gob. mx/index.php/antropologia/article/view/2776.
- Rehding, A., 2013. Ecomusicology between Apocalypse and Nostalgia. J. Am. Musicological Soc. 64 (2), 409–414. https://doi.org/10.1525/jams.2011.64.2.409.
- Reichert, R., 2021. El Transporte de Maderas Para Los Departamentos Navales Españoles En La Segunda Mitad Del Siglo XVIII (The Transport of Timbers for the Spanish Naval Departments in the Second Half of the 18th Century). Studia Historica: Historia Moderna 43 (1), 47–70. https://doi.org/10.14201/shhmo20214314770.
- Revill, G., 1991. The lark ascending: monument to a radical pastoral. Landscape Res. 16 (2), 25–30. https://doi.org/10.1080/01426399108706336.
- Revill, G., 1998. Samuel Coleridge-Taylor's geography of disappointment: hybridity, identity, and networks of musical meaning. In: Leyshon, A., Matless, D., Revill, G. (Eds.), The Place of Music. The Guilford Press, New York, NY, pp. 197–221.
- Revill, G., 2000. Music and the politics of sound: nationalism, citizenship, and auditory space. Environ. Plan. d: Soc. Space 18 (1), 597–613. https://doi.org/10.1068/d224t.
- Revill, G., 2014. El Tren Fantasma: arcs of sound and the acoustic spaces of landscape. Trans. Inst. British Geographers 39 (3), 333–344. https://doi.org/10.1111/ tran.12034.
- Revill, G., 2016. How is space made in sound? Spatial mediation, critical phenomenology and the political agency of sound. Progress in Human Geography 40 (2), 240–256. https://doi.org/10.1177/0309132515572271.
- Rocha, Y.T., Presotto, A., Cavalheiro, F., 2007. The Representation of Caesalpinia Echinata (Brazilwood) in Sixteenth-and-Seventeenth-Century Maps. Anais Da Academia Brasileira De Ciencias 79 (4), 751–765. https://doi.org/10.1590/S0001-37652007000400014.
- Said, E.W., 1994. Culture and Imperialism. Vintage Books, New York.
- Saldanha, A., 2008. Heterotopia and structuralism. Environ. Plan. A 40 (9), 2080–2096. https://doi.org/10.1068/a39336.
- Saldanna, A., 2010. Two birds of paradise in North Holland, 1592: the gift in the exotic. Parallax 16 (1), 68–79. https://doi.org/10.1080/13534640903478775.
- Schwartz, J.A., 2019. How the Sea Is Sounded: Remapping Indigenous Soundings in the Marshallese Diaspora. In: Steingo, G., Sykes, J. (Eds.), Remapping Sound Studies. Duke University Press, Durham & London, pp. 77–105.
- Siemens, A.H., Brinkmann, L., 1976. El Sur de Veracruz a Finales Del Siglo XVIII—Un Análisis de La "Relación" de Corral. Historia Mexicana 263–324.
- Te Punga Somerville, A., 2017. Where oceans come from Comparative Literat. 69 (1), $25\text{--}31.\ https://doi.org/10.1215/00104124-3794579.}$
- Thiébaut, V., 2013. Paisaje e Identidad. El Río Papaloapan, Elemento Funcional y Simbólico de Los Paisajes Del Sotavento. LiminaR. Estudios Sociales y Humanísticos. XI.2, 82–99.
- Tuan, Y.F. (Ed.), 1990. Topophilia: A Study of Environmental Perception, Attitudes, and Values. Columbia University Press, New York.
- Velasco Toro, J., 2003. In: Cosmovisión y Deidades Prehispánicas de La Tierra y El Agua En Los Pueblos Del Papaloapan Veracruzano, 25. Boletín Del Archivo Histórico Del Agua, pp. 5 – 17.
- Velasco Toro, J., 2004. Espacio y Comercio Colonial En La Región Sotaventina Del Bajo Papaloapan, Veracruz. Revista Del CELSA 6, 145–165.
- Whiteley, S., Bennet, A., Hawkins, S. (Eds.), 2004. Music, Space and Place: Popular Music and Cultural Identity. Ashgate Publishing Limited, Aldershot.