



Research

North Sea: Landscapes of Coexistence
Transitional Territories Studio 2019-2020
North Sea: Topography of Chance

Research Report

The Naked Island

Unveiling the Dichotomy
of Productive and Romantic Territories

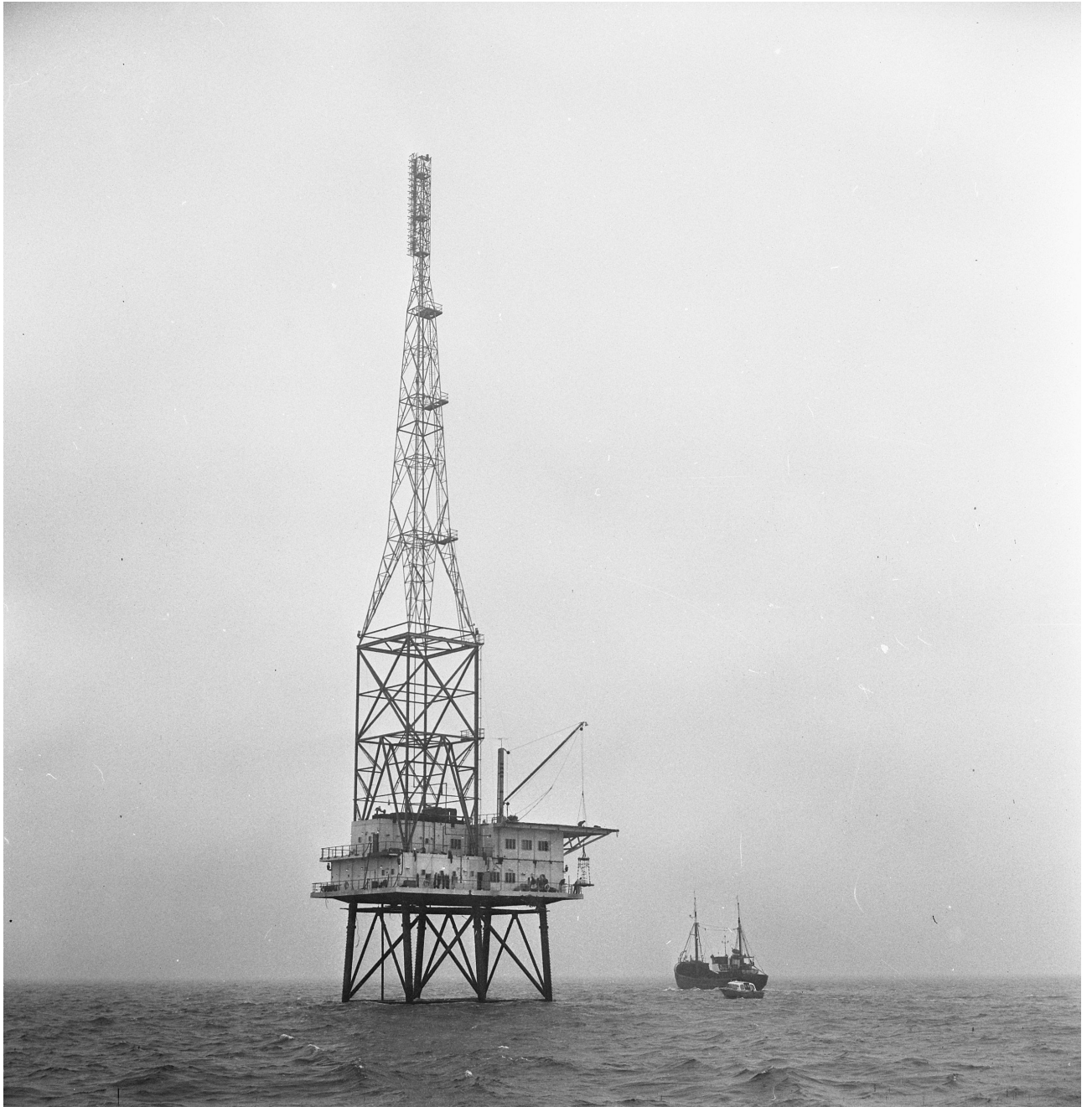
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REM (Reclame Exploitatie
Maatschappij) Island, Radio
Nordzee, 1963-64. Six miles
off Noordwijk.



Manifesto

We live in times of radical transformations.

If Land was delimited by property rights and occupied by states claims, Sea was limit-less in its impossibility to be enclosed within virtual boundaries. Land meant enforcement of collective laws and Sea meant awareness of individual freedom. If Land existed on the concept of physical and mental contexts – cultural, political, social, geographical – Sea was context-less in its denial of three-dimensional perspectives and fixed points of orientation. Land was static and Sea was dynamic. Land is space and Sea is time. If Land was the host of the farm, the park, the highway, the city, Sea was the wild field for fish-hunt, exploration, war and trade. Today, things are changing. Sea is now the host of the algae-farm, the wind-park, the vessels-highway, the extraction-city. Land, as a limited Territory, is reaching its limit capacity: to ensure our perpetual need of growth, Sea is becoming a Territory.

A Territory is therefore the outcome of a process. Three phases shape its configuration: from the exploration of a *terra nullius*, to the will of political control on a mapped area, until the imposition of the exploitative order through a (master)plan. It is a linear univocal movement in time from an irrational situation to a rational condition. An inevitable path which first trapped Land, and now threatens Sea.

We also live in times of radical choices.

Territory is a political technology. It is the spatial representation of the perpetual tension between the individual will to freely explore, and the collective need to intensively exploit. The territorialization-urbanization of Sea poses in front of our societies the challenge to find a synthesis between these two opposite yet equally crucial trends. Which image-memory of Sea should survive?

In the Age of the European Sunset, the dualism which lays at the very base of the first idea of Europe – the conflict between Real and Ideal, Rational and Irrational – needs to find its final – yet not definitive – balance.

Liberty leading... Who does the Sea belong to?
Individual and Collective Freedom(s),
a history of perpetual confrontations.

collage sources:
E. Delacroix, *Liberty leading the People*, 1830.
C.D. Friedrich, *The Monk by the Sea*, 1808-10.





1.
TERRITORY:
NORTH SEA

1. Territory: North Sea

1.1. Identity

The sea is a nomadic element: a vector for dynamic exchanges, being them of peace or war, of trade or colonization, of freedom or exploitation. More than others, the shallow waters of the North Sea have been for long the background of the human theatre of naval battles, commercial exchanges, fishing wars. These waters, sometimes calm, sometimes tumultuous, have been pride, welcoming the glorious victories of national fleets, as well as shame, due to the deadly outcomes of devastating thunderstorms. The Peoples who lived on the North Sea are legends in our history books: at the beginning were the Vikings, the Normans, the Saxons, and later the British Empire, the Dutch Companies, the German Fleets, all of them have always looked at these waters with confidence and fear, pride and respect. The starting point of extensive colonization processes, as well as an important battleground for both world wars, the North Sea has been the background for both evil and good. However, it is not a background anymore: with the discovery of the huge amount of resources it hosts - aggregates, oil, wind - a massive phenomenon of exploitation has been taking place since the second half of the XIX century, and still happens today. Even though the gathering of certain resources - fish, oysters, etc. - has always existed on the North Sea, the behaviours around this new wave of exploitations have never been witnessed before: it is a real process of colonization.

Alienating from the original and historical meaning of this Sea to its surrounding Peoples, this new exploitative pattern is strongly affecting millenary balances - of coexistence, of domain, of power. To study where this phenomenon of territorialization of the sea might lead us, “the Oceanic Project” aims to map and study multiple projections of potential future power-scapes around the North Sea.

1.2. The Oceanic Project: a Power-scape

This section (1.2.) is an adaptation from the original manifesto of The Oceanic Project Group, following one of six lines of collective territorial research - The Atlas - within the frame of the Transitional Territories 2019/20 studio.

Cartography: Mapping Power-scapes

In dissecting ‘the Oceanic Project’, we began by interpreting the term ‘oceanic’ as a pre-marked and changing maritime canvas of possibilities, continuously being shaped by natural forces and anthropic powers. Simultaneously, we understand the term ‘project’ to be an anthropic one, implying both the forecasting of the future canvas (‘projection’) and designing for that future (a design ‘project’).

Given the anthropic slant of this definition, we also applied a lens which sought to identify the actors with significant ability to shape the canvas. We began with a hunch that power was concentrated in specific points, and that there might exist clusters of such points which together formed an island. Beyond these power islands would exist a peripheral edge. We speculated that sometimes this edge is productive, sometimes it is forgotten. In either case, the edge is thus far removed from the decision-making island of power. Our analysis sought to address anthropic islands of power, and the lack of it at the edge. Our definition carries an implicit hierarchy, where power > island > edge.



Before attempting to project/envisage changes to the canvas, we sought to define key elements that produce power. We suggested that trade, legislation, education, population flows, and land value were indicative of power and in turn indicated actors with significant ability to shape the Oceanic Project's canvas and were consequently worth investigating.

Deconstruction: Introducing the 4th Dimension

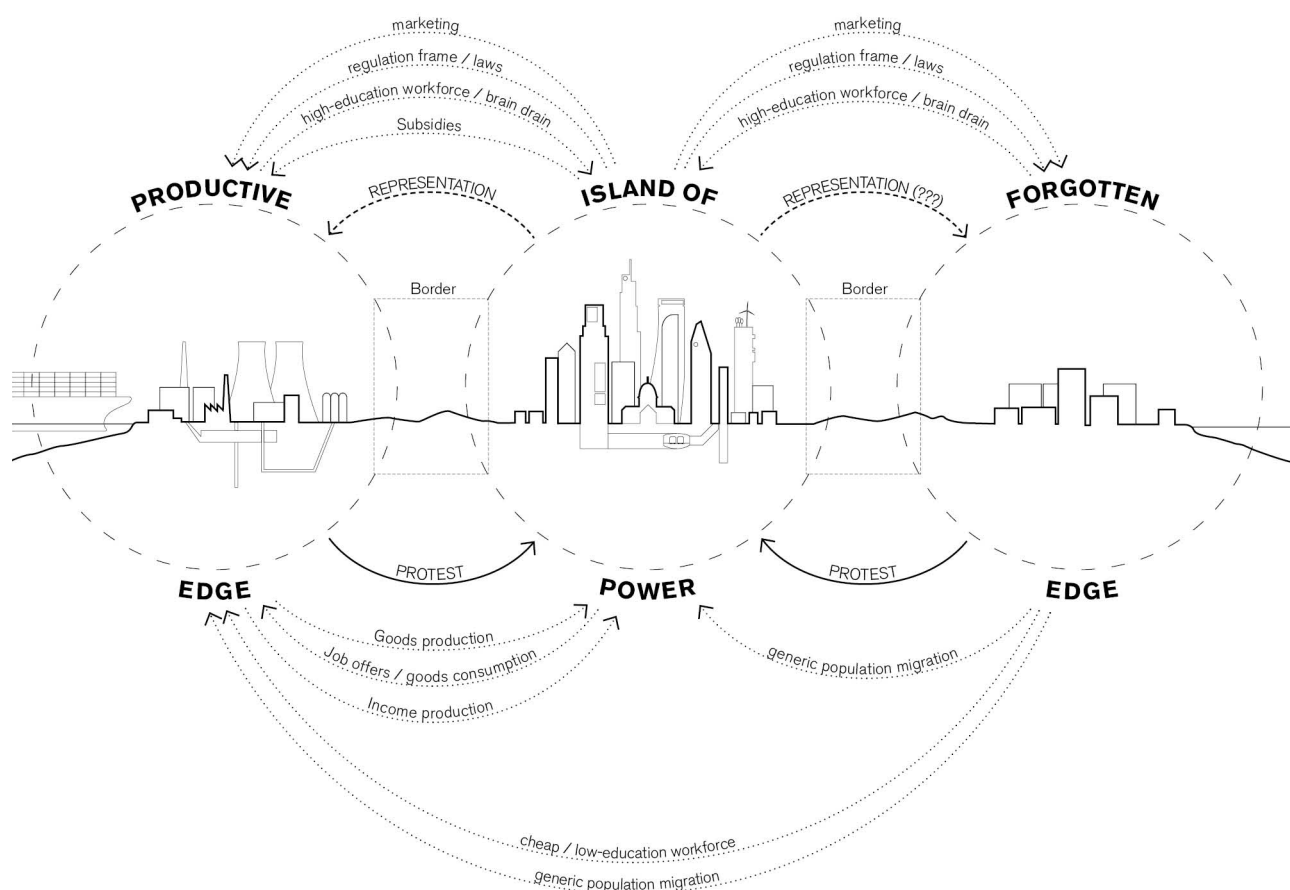
After mapping the current incarnation of power > island > edge, we then set about deconstructing how such a map came to be so. We sought to do this by introducing the notion of time and consequently deconstructing the power > island > edge model through the last centuries.

This speculation led to the definition of the power-scape as the precise duality of core and periphery - which here are named islands and edges - ruled by processes of representation - which are granted by the islands of power to its edges - and protest - namely the direct way of the edges to make their voice being listened by the core. The North Sea power-scape results in a perpetual conflict between the islands of power, or the cities, and their productive and forgotten edges, namely the territory. Therefore, the power of and around the North Sea is highly centralised in dense, urban areas. Power is in large part also self-perpetuating, and with a gravitational pull. The strongest gravitational power lies in the southwestern portion of the North Sea, with secondary islands scattered around the remaining coast. Power is largely equitable with urbanisation.

Projection: Decline and Memory

The Oceanic Project must ask if this self-perpetuating power-island model (urbanisation) can be sustained as is or ad infinitum. As the oceanic canvas changes, projections indicate a warming, increasingly polluted climate; the increasing importance of data and digitalisation of societal structures; a necessary energy transition; an increasing population (until 2050), and consequently an acute need for expanded/improved food production. Thus, project action in the design sense must take these or other changes and seek to test if the current power-island model holds, whether it requires a new series of power-islands, or whether the power-island model holds at all.

Taking the wielding of power and the production of power as two axes for a quadrant of scenarios (ranging in each case from high centralisation > high territorialisation) we proposed four scenarios for how the North Sea canvas might look. We think it is important to position a project in relation to these scenarios. By doing so one can begin to identify which pillars of power might survive the expected changes, which will fail, and perhaps potential new pillars which do not yet exist. Relating the four scenarios, we can also read a single story: it narrates the gradual process of rationalization of the world - after land, it happens to sea - and the rise and collapse of islands of power; but most importantly, it tells us about the risk of losing the memory of the sea. Memory and Reality, Ideal and Real, Balance and Decline: dichotomies become the key elements to understand any power-scape; the confrontation of opposites unveils the Oceanic Project.

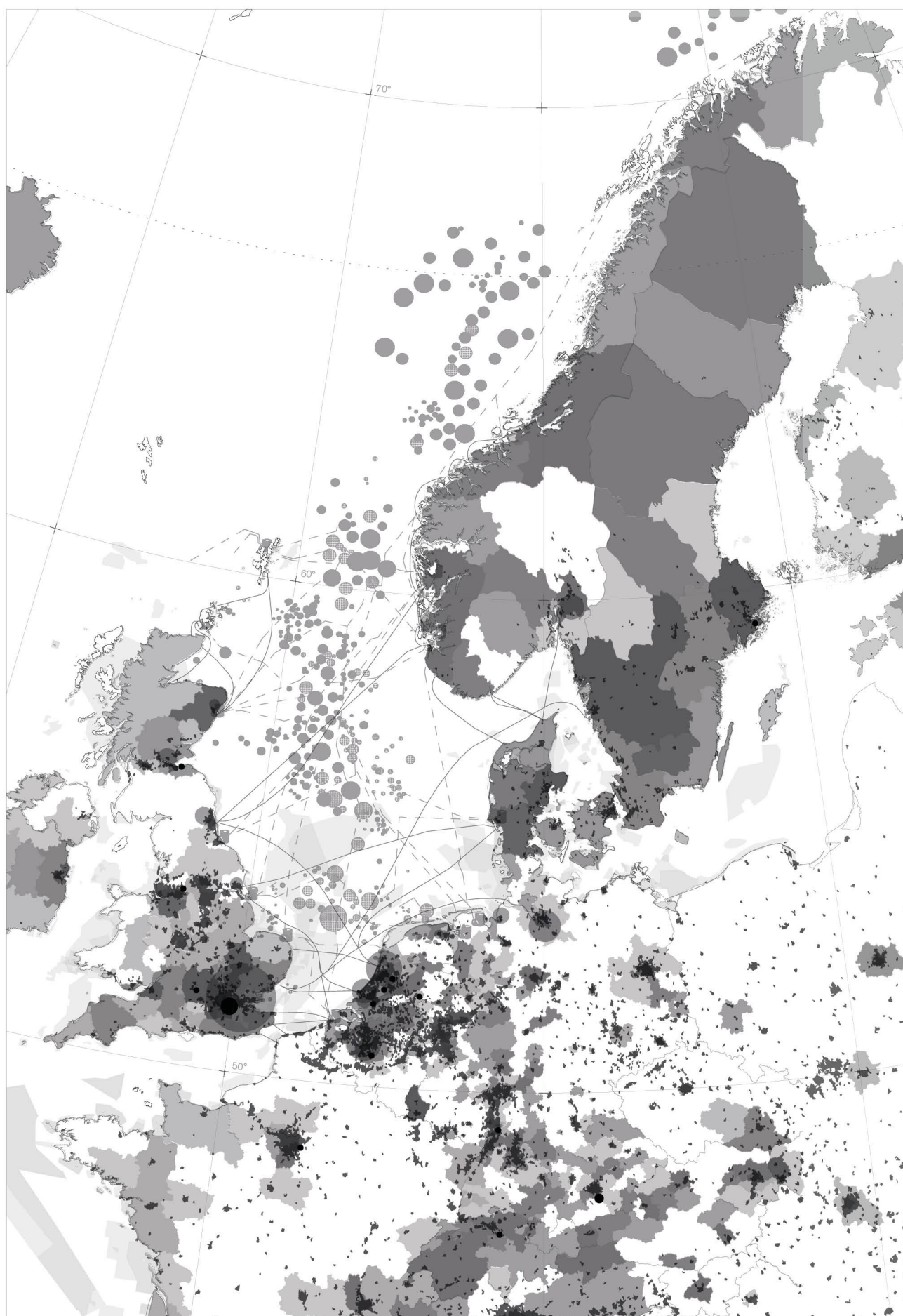


Cartography: Current Power State/Power-scape

The map shows the projection of the current power state/power-scape around the North Sea. This result is achieved with the superimposition of a selection of data from the construction analysis. More specifically, besides different data, the map features different intensities given by the overlap of NUTs3 with a >110% GDP per inhabitant (in PPS), NUTs2 with a >90% rate of international tertiary education graduates employment and NUTs2 with a rate of population change higher than 4/1000 people. The final result can inform on the preminence of certain areas around the North Sea on others, to be considered more “remote” in a power-scape perspective.

Eurostat, *Eurostat regional yearbook*, 2019, retrieved from <http://ec.europa.eu/eurostat/statistical-atlas/gis/viewer/>, on 23.10.2019.

- | | |
|---------------------------|-----------------------|
| ■ 100% intensity | ● GDP of main cities |
| ■ 75% intensity | ● Maritime oil fields |
| ■ 50% intensity | ■ Maritime gas fields |
| ■ 25% intensity | ~ Ferries |
| ■ Natura 2000 sea areas | -- Pipelines |
| ■ Dense urban areas | |
| ● Top global universities | |













Deconstruction: Globalisation and Digitalisation in the 21st Century

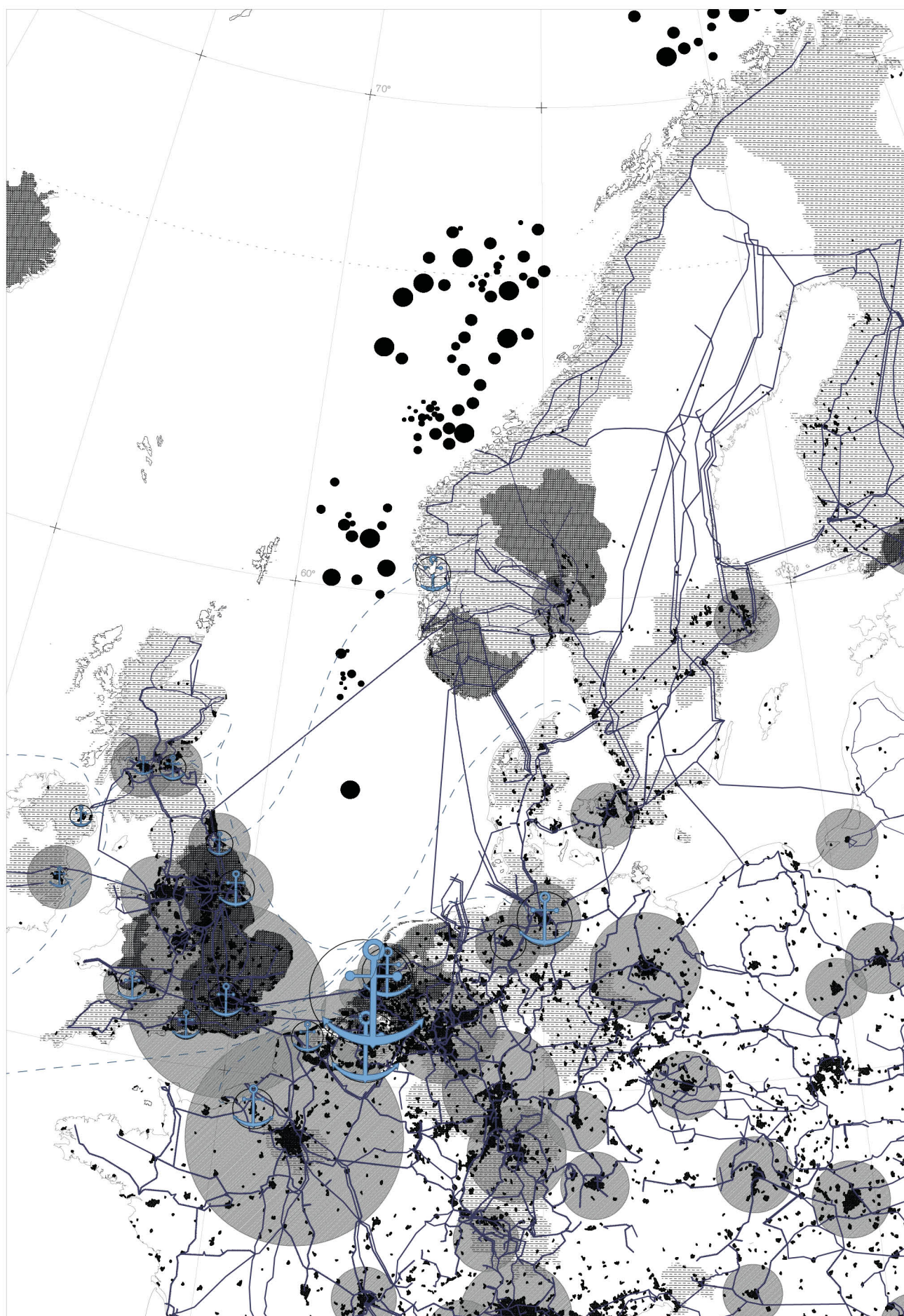
The map seeks to deconstruct the power > island > edge relation of the 21st Century. Here, we see a return to contraction of the power islands around key North Sea ports. Industrialisation declines in importance and the continued exploitation of the sea. High population densities are now very much a symptom rather than a root cause of power. The productive territory and island of power are now quite separated.

Rutte, Reinout and Abrahamse, Jaap Evert. *Atlas of the Dutch Urban Landscape: a millennium of spatial development*. Thoth Uitgeverij, 2016.

Antunes, Cátia. Early Modern Ports, 1500–1750, in: *European History Online*, Mainz 2010-12-03. Available from: <http://www.ieg-ego.eu/antunes-2010-en> URN: urn:nbn:de:0159-2010102547 Accessed 23.10.2019.

Transitional Territories Studio. *North Sea Atlas, 2018-2019*. TU Delft, 2019. p. 56-57

-  port
-  selected city population
-  oil field
-  natural gas field
-  urban areas
-  90-95% broadband access
-  >95% broadband access
-  shipping route
-  oil/gas pipelines
-  high voltage electricity grid



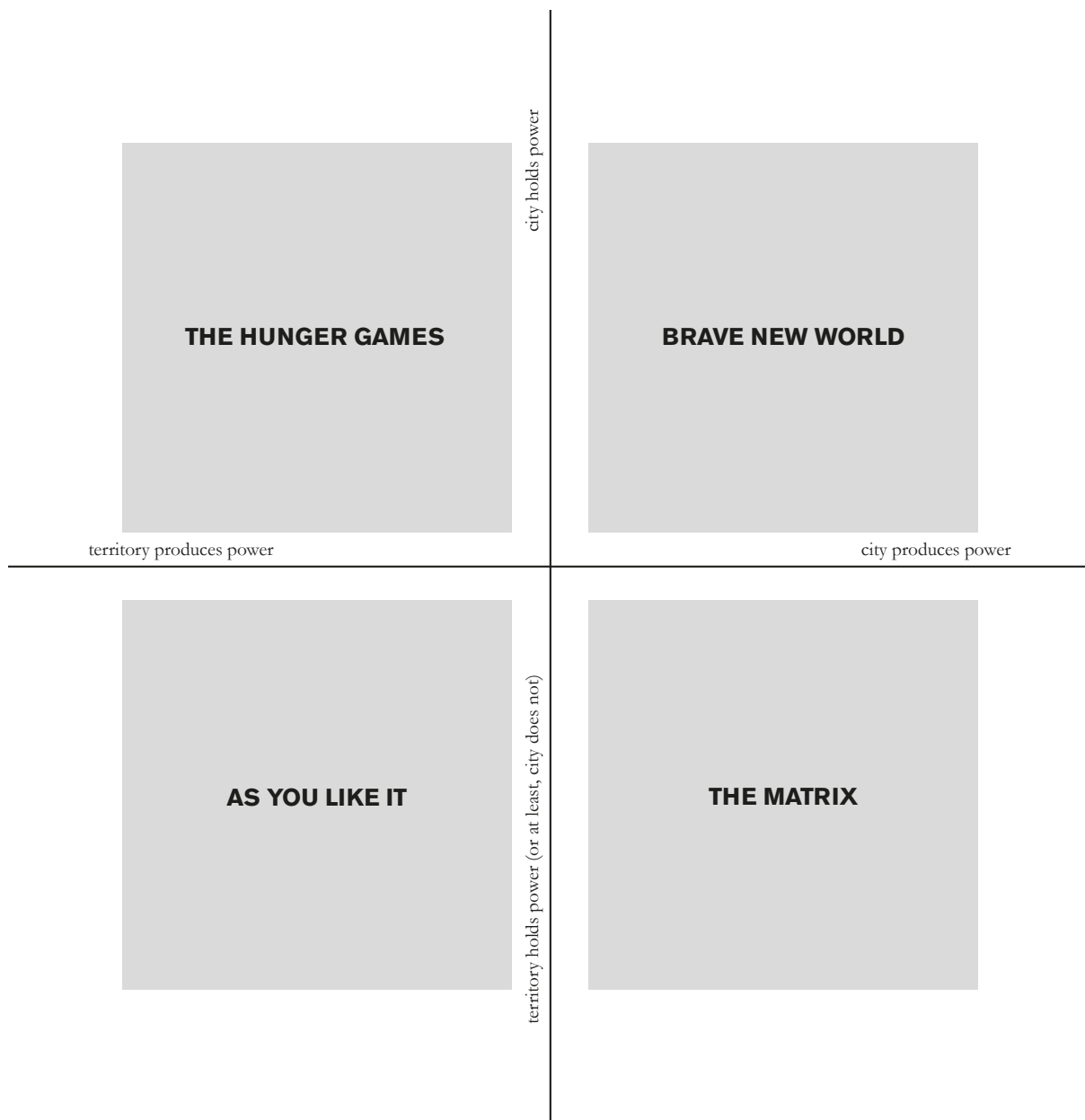
Projection: Scenario's Compass and the Theme of Memory

The cartography and deconstruction phases allowed a first and second understanding of the North Sea power-scapes/power states - the former thorough spatial features, the latter through the dimension of time. However, a projection phase is necessary to highlight four extremes - which can all be spotted in the present condition as well. Therefore, these four scenarios represent four different societies, or four perspective on the same society. However, a third reading is possible: the scenarios can also be put in a time-line, finally unveiling the hidden theme of loss of memory of a territory.

Here is shown a compass to allow an easier navigation of the scenarios. These four projections are understood as four extremes along two main features: the power-holding actor and the power-producing

actor, which alternatively are city-territory, city-city, territory-city, territory-territory. To radicalize these views, the power-producing actor is always imagined as non-represented in any sort of decisional process, thus completely exploited - colonized! - by the power-holding actor. City and territory can also be read as two different organizational patterns: the former expressing a centralized model, the latter showing the opposite de-centralized or fragmented condition.

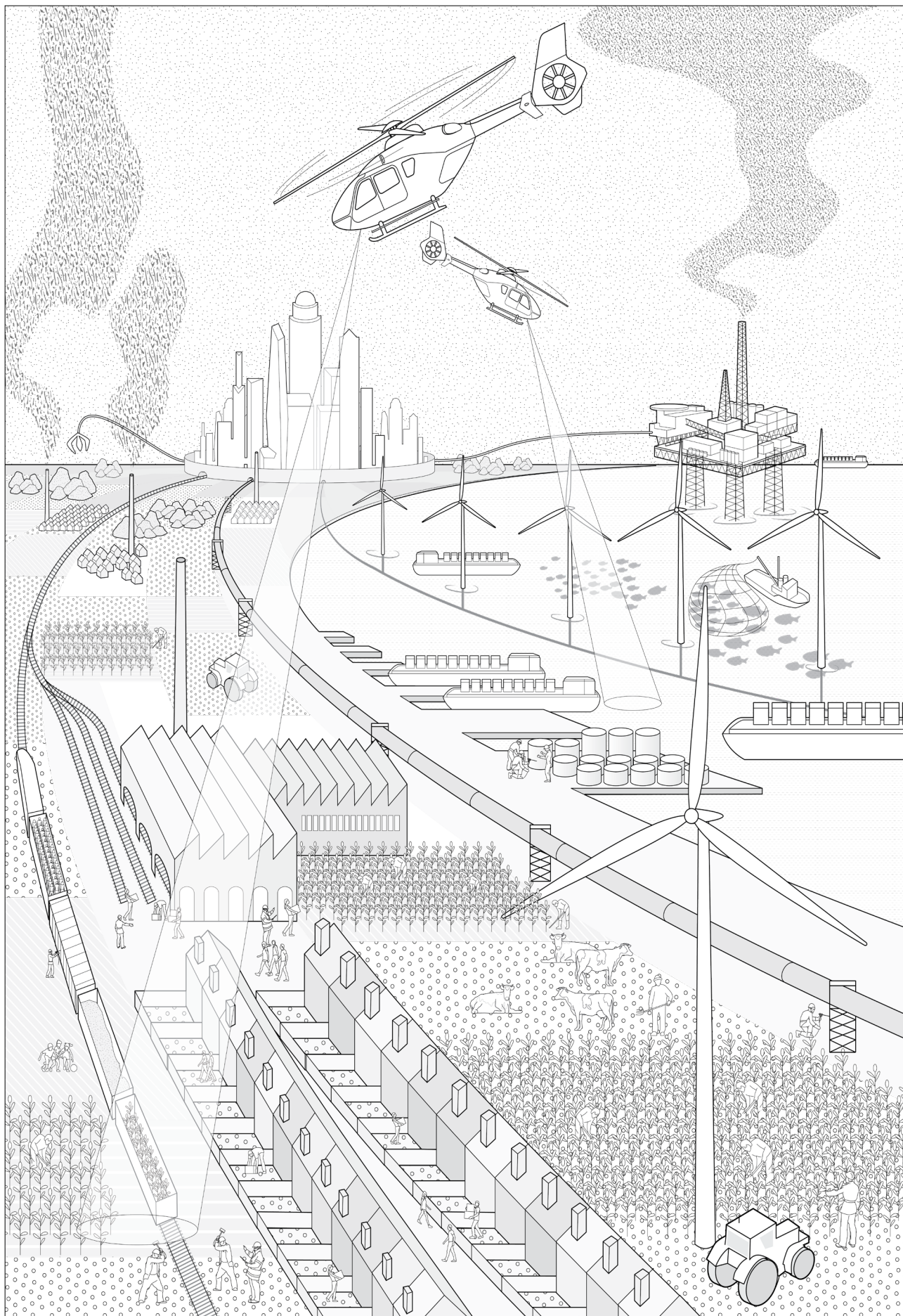
Infrastructural networks play a key role in the projections: they are the background which allows not only exchanges, but most of all the exploitation logics themselves. Indeed, without the adequate infrastructure, resources or power itself cannot be transferred from one place to another.



Scenario 1: The Hunger Games

In first scenario, the city lives like a giant, powerful parasite by harvesting the productivity of the surrounding territory. A non-circular economy operates, lurching from one resource to the next as each is gradually exhausted in turn. Forgotten edges exist around exhausted resources, and people living within these areas can even act as an exploited resource as in Suzanne Collins' *The Hunger Games* of 2008. Efficiency varies depending on the availability of resources to be exploited and rises as required resources become scarcer. In order to exploit the territory, infrastructure runs radially to the most powerful city islands, with increasing capacity as we approach the city. Densely populated cities take advantage of max-

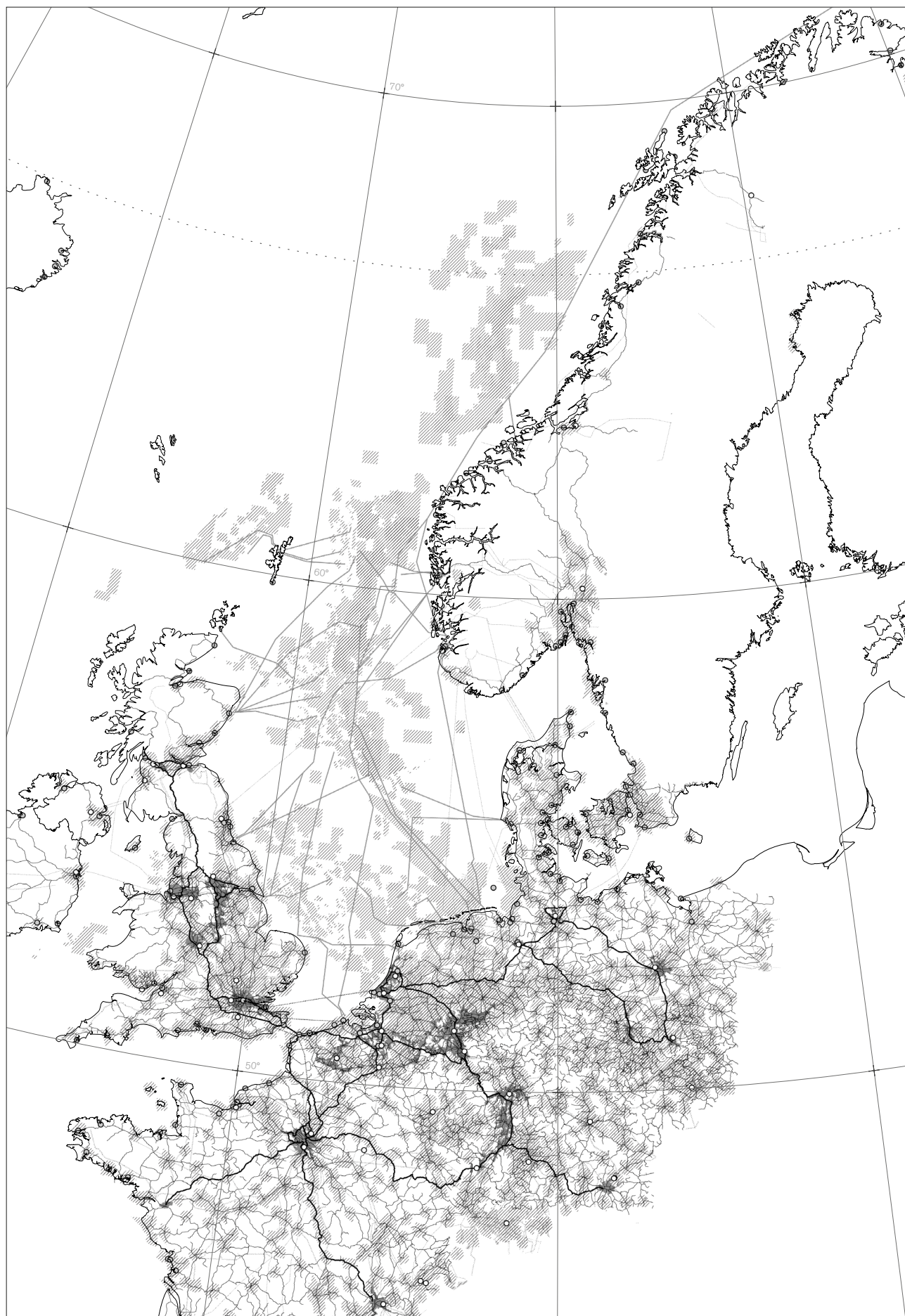
imum exploitation, while a sparsely populated surrounding territory exists to serve those cities. The wielding of power is highly centralised and depends on exploiting resources while preventing others from doing so. This results in high inequality both within cities and between the cities and the territory. However, careful management of power likely prevents conflict within individual city-territory structures, though conflict between competing city-territory structures remains highly possible. Energy Generation is managed by large corporations or is state-owned, though it could include a variety of sources: nuclear, fossil fuels, renewables or even some new source of energy generation.



**Scenario 1:
Totalitarianism**

The condition represented in this first scenario could be defined a Totalitarian one: an autocratic system which proceeds towards the definitive break of the historical dual relation of city and territory.

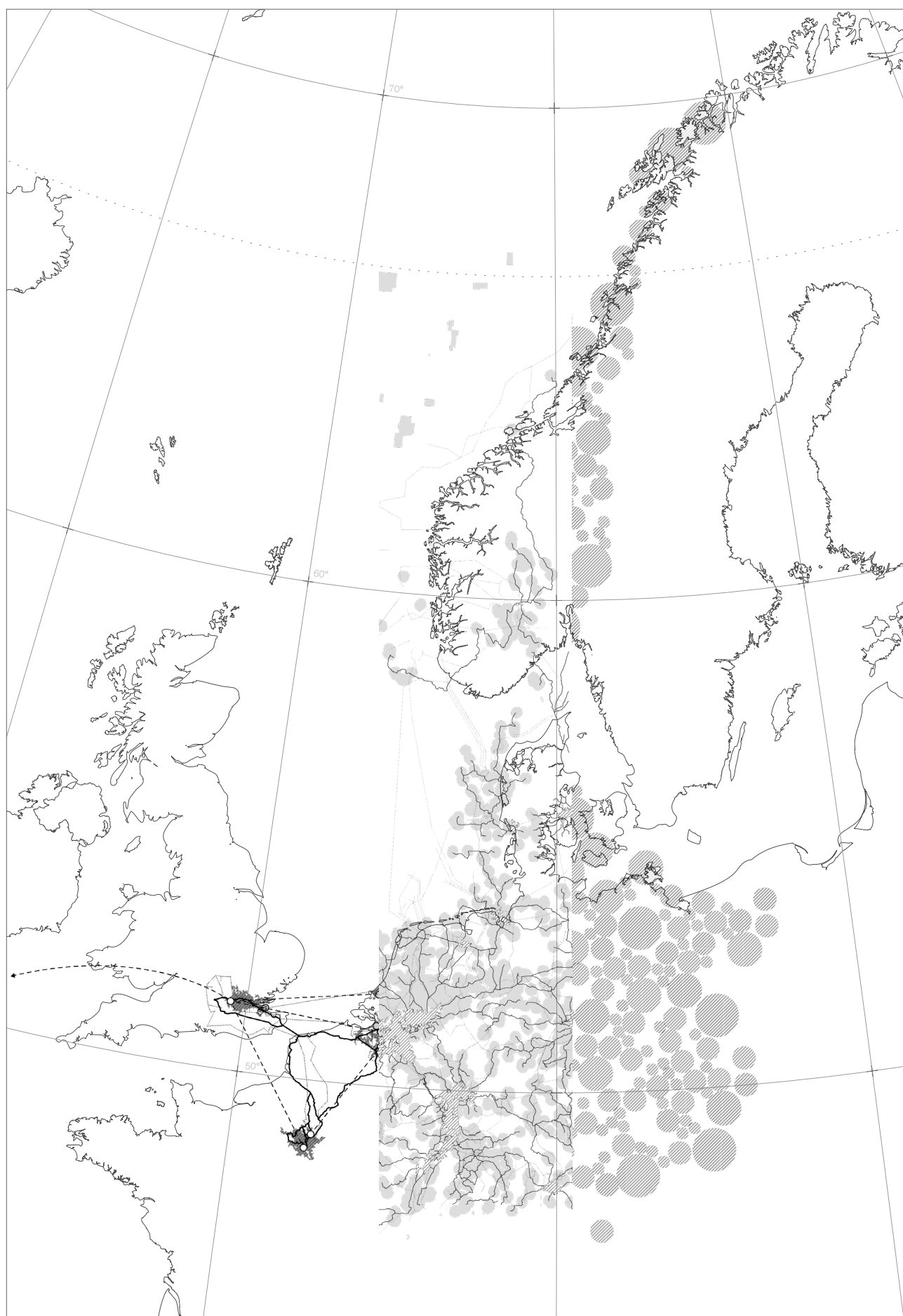
-
- ///
- Airport
- Harbor
- Primary railway
- Secondary railway
- Primary electricity grid
- Secondary electric grid
- Oil pipes



Scenarios 2,3,4: Retreat and Expansion

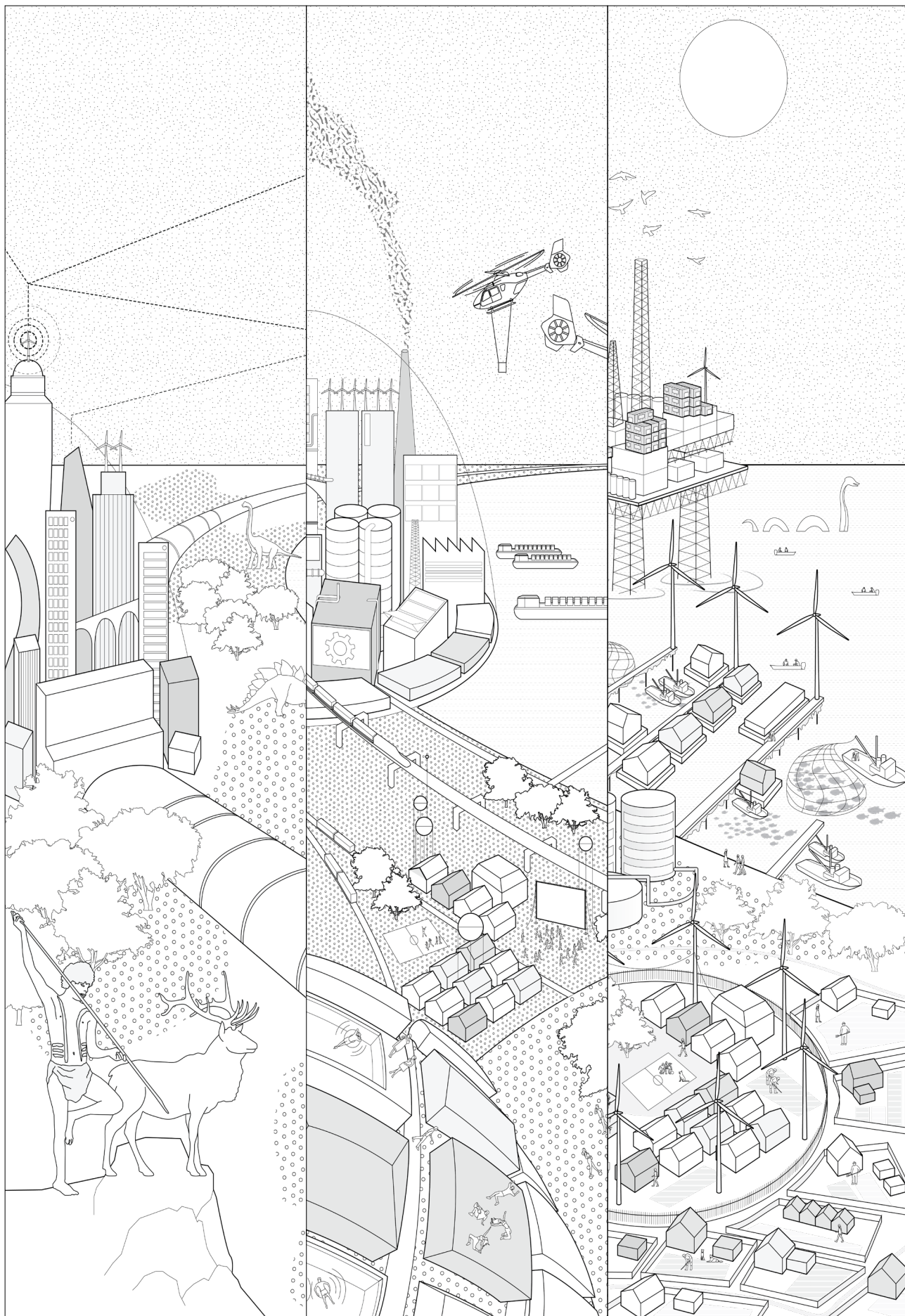
Following a path dependence logic, opposite phenomena of retreat and expansion of power-holding and power-production areas is imagined. However, the real essence of their dualism is lost in the process.

- Powerful area, high density
- Powerful area, medium density
- Powerful area, low density
- /// Exploited area
- Airport
- Harbor
- Railway
- Electric grid
- - Aerial connection



Scenarios 2,3,4: Towards Anarchism

What is left is a condition of Anarchism, here understood as the definitive denial of the city - the centralizing element - and the final victory of the territory as fragmented reality of self-sufficiency. The theme of representation completely loses any meaning, and any sort of relation - conflict or exchange - is avoided, if not unnecessary. Within this anarcho-primitivist condition of the territory there is no place for memory: knowledge, as a tool of progress and evolution, is pointless, since there is no hope for any mutation, or not even awareness of the possibility of mutation. Both the totalitarian centralized city system and the hyper-fragmented anarchic territorial system are a threat.







1. Territory: North Sea

1.3. Temporal Epistemology of Territorialization

1.3.1. Ontology of the (European) Territory

“Territory is a *historical* question: produced, mutable, and fluid. It is *geographical*, not simply because it is one of the ways of ordering the world, but also because it is profoundly uneven in its development. [...] It is a *political* question, but in a broad sense: economic, strategic, legal, and technical”(1).

To grasp the real meaning of Territory is not an easy matter: it is a very wide and sometimes blurred notion, or tool, or technology, or all of them. Nevertheless, it has the character of a powerful element around which our modern societies still exist and expand: therefore, it becomes crucial to understand its ontological significance. Consequently, to better research its meaning – as a notion, tool, technology – the Territory will be here speculatively deconstructed in two main components. The first one, *Topos*, which can be measured by senses, implies the most physical and direct expression of a Territory; it is also its most impulsive – almost univocal – definition in the common imaginary, when it means for instance a specific geographic area or region: a landscape is often misunderstood as Territory. However, the Territory owns also a second component, which is the structure, or *Nomos*. An artificially imposed system, a social and political order made of laws. *Nomos* and *Topos*, *Ordnung und Ortung* (2), Order and Location. The definition of a structure is therefore the very act of differentiation from the generic landscape, thus the founding act of a Territory.

The true meaning of *Nomos* can be found in its etymology. *Nomos* comes from *némein*, the ancient Greek word used to express the act of claiming or to occupy, divide, distribute, exploit; among this list, another curious meaning is found: to graze. Two facts emerge from this: first, the strong embeddedness of the notion of *Nomos* – thus of territorial structure and Territory – in Land, or in the exploitation of Land in the form of pasture: this will bring many questions regarding the application of the same notion of *Nomos*/Territory to Sea (3). Secondly, the sequence of rationalizing actions of occupation, division and distribution, which expresses the necessary process of measure and control to create a Territory; therefore, the Territory is an artificial imposition of a forced anthropization of land, which is then subject to sovereignty and shaped by precise borders: it is a political technology (4).

As a clarification, it must be understood that the idea of Territory here studied lies within a very specific geographical, historical and cultural context, which is the European one. This choice of context comes for some reasons. Firstly, the physical and geographical context of research of this thesis is the North Sea, which is one of the two main European seas – the other being the Mediterranean Sea. Secondly, the understanding of territorialization as exploration, conquest and exploitation of the so-called *terrae nullius* – the rationalization of the New Worlds – finds its historical precedents in the process of colonization perpetuated by certain European powers towards the rest of the world: “Europe is a hungry lion” in its will of hegemony – political, religious, cultural – thus in its will of imposition of its *Nomos* (5). Thirdly, this idea of total rationalization as hegemonic scientific and cultural approach towards every aspect of life has been exported and imposed by historical European powers, which anyway are now victims of it themselves (6). Fourthly and lastly, for the eternal conflict between Ideal and Real as engine of modern global state-societies, Europe can be defined “the universal civilization, global in its own meaning [the Roman Empire, the French Revolution, the World Wars, etc.]; where does Europe end, where does it start? Europe is beyond, and its spirit becomes the global spirit”(7).

1. Elden, Stuart. *The Birth of Territory*, Chicago, London: The University of Chicago Press, 2013.

2. Schmitt, Carl. *The Nomos of the Earth*, New York: Telos Press Publishing, 2003. First ed. *Der Nomos der Erde*, Berlin: Duncker & Humblot, 1950.

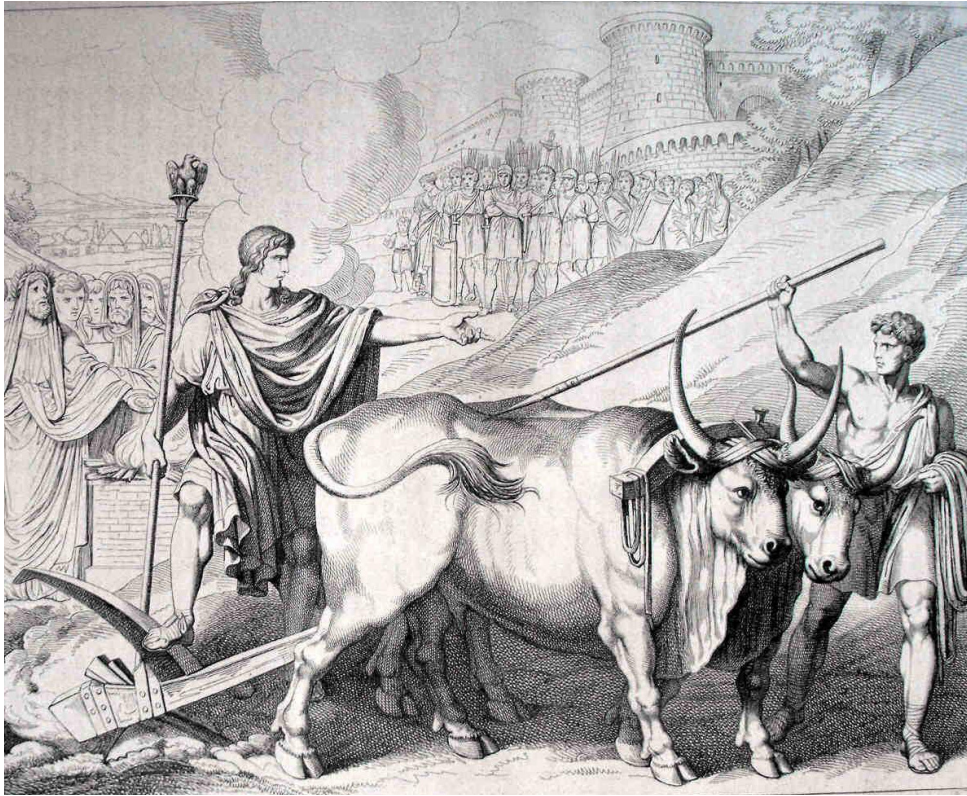
3. Schmitt, Carl. *Land and Sea*, New York: Telos Press Publishing, 2015. First ed. *Land und Meer*, Berlin, 1942.

4. Elden, *The Birth of Territory*.

5. Hegel, Georg Wilhelm Friedrich. *Lectures on the Philosophy of History* in Cacciari, Massimo. *Geofilosofia dell'Europa*, Milano: Adelphi, 1994.

6. On this theme, it is relevant to read on the “Philosophy of the Weakening” and the Self-colonization of the West as theorized by Vattimo, Par Gianni. *La filosofia e il tramonto dell'Occidente*.

7. Cacciari, Massimo. *L'Arcipelago*, Milano: Adelphi, 1997.



Pinelli, Bartolomeo. *Romolo segna col l'Aratro una linea intorno al Monte Palatino per fabbricarvi le mura della Città di Roma* (Romolo marks with the plow a line around Mons Palatinus to build the walls of the City of Rome), 1818. One of the most famous and literal territorial claims.



Talmage, Algernon. *The Founding of Australia* 1788, 1937, London. One of the most explicit cases of claiming of a "terra nullius".

1.3.2. The Sea Dilemma - Philosophy of the Sea

As already stated, the transposition of the notion of *Nomos*/Territory from Land to Sea – thus the idea of the territorialization of the sea – might be a challenging issue, if not even a controversial one, for the embeddedness of the concept of *Nomos*/Territory on the claiming, occupation, division and exploitation – of land. To further understand this, the history of the instable relations of the European man with the sea – or similar bodies of water – plays a key role; indeed, the Territory is an artificial structure which is superimposed by men on the geography around them, thus their relation which such geography becomes topical. This subject has been the matter of concern for many big and small thinkers since the times of ancient Greece, or even before. Therefore, after an accurate yet brief history of men and sea (8), a selection of opinions and theories will be here presented.

8. On this subject: Guérard, Cécile. *Philosophie légère de la mer*, Paris: Edition des Equateurs, 2006.

“Is it not remarkable that a human being standing on the shore would direct its eyes quite naturally from the land towards the sea and not the other way round, that is, from the sea to the land? In people’s deepest and often unconscious memories, water and the sea are the mysterious and primordial source of all life”(9).

9. Schmitt, *Land and Sea*.

This romantic perspective offered by Schmitt unveils clearly the strong dichotomy existing between Land and Sea, one being our natural point of observation, and the other being the obvious horizon towards which we direct our sight. Land is the basic condition of men, Sea is the promise of many other potential conditions; Land is the *Real* in which we are forcedly rooted, and Sea is the *Ideal* towards which we stretch. However, this position has radically changed throughout human history, and still evolves. From the biblical terror of the sea – the theatre of the apocalypse – and the mythological fear of the unknown, to the classical renaissance of exploration, travel and journeys – in the rediscovered memories of Ulysses, Enea and other Greek and Latin authors; finally, the sea becomes a therapeutic destination for the elites, a sublime subject for artists, a vernacular background for poets: a history of growing “desire of the sea” (10), meant as potential – of freedom.

10. For an extensive publication on this topic, see Corbin, Alain. *Le territoire du vide: L'occident et le désir du rivage 1750-1840*, Paris: Aubier, 1988.

Here finds its origin the romantic vision of Sea as a limit-less, context-less surface to be dynamically explored and experienced, whereas its opposite, Land, roots men to its borders, properties and any other sort of limits (11). “The land, the river plain fixes the man to the ground; his freedom is then restricted by an enormous complex of relations. The sea brings the man beyond these limits” (12). In this romantic vision, the sea cannot be territorialized: the imposition of a structure, *Nomos*/Territory, is unimaginable, the possibility to claim, occupy, divide, distribute and exploit the sea is unbelievable. However, the growing “desire of the sea” meant also another potential – one of hegemony. While rediscovering the classical travellers and their romantic adventures, modern explorers were mapping the once unknown lands and seas, opening the path for modern thalassocracies to conquer and subjugate beyond their original limits. The sea has been included in the linear progress of history: a gradual process of rationalization and exploitation – the urbanization of the sea! – is substituting the romantic dream of the untouched horizon.

11. Cacciatori, Giuseppe. *Mediterraneo e cultura europea*, Soveria: Rubettino Editore, 2003.

12. Hegel, *Lectures on the Philosophy of History*, in Cacciari, *Geofilosofia dell'Europa*.

Therefore, this is the pivotal point, the dilemma. How can the sea be a Territory, denying its ontological meaning? Is there any space for a territorialized sea which could still include its original *raison d'être*? Two lines of inquiry will be followed. If the Territory is a political technology, then the sea becomes the hegemonic space of the nation-state. On the other hand, if the Territory is an a-political technology, therefore the sea becomes the model of expansion for growing urbanization. However, a common ground exists between the two: it is the will of rationalization as colonization of a *terra/mare nullius*: a new Ontology of the (European) Sea-Territory will be defined from this position.



Turner, J. M. William. *A Coast Scene with Fishermen Hauling a Boat Ashore* ("The Iveagh Sea Piece"), 1803. The romantic sublime of the Sea.



Cromarty Firth, Scotland (UK). Oil platform repairing and fabrication.

1.3.3. The Political Territory - Leviathan

To define a Territory as a political technology, it is first necessary to clarify what is *political*. According to Carl Schmitt, the notion of political defines the space between confronting subjects, a friend/enemy relationship (13): it means confrontation, or conflict. Thus, the political exists only if two opposites – or adversaries – are divided, distinguished: notions which are all included in *némein*, and thus in *Nomos*. The ontology of a Territory is indeed in the idea of bounding some land, which is thus identified and differentiated from all the rest of lands: a process of definition towards the *other*. Here also lies the origin of the political idea of Europe: as a multitude of free cities – the Greek *poleis* – which are all distinct “islands”, yet a harmonic unity which finds its common ground in the definition as non-Asia – the historical opponent (14). “It is in the nature of Europe the awareness of being only a part”(15): a part opposed to another, but also a part in a “sea” of other parts, a condition which is expressed by the very special metaphor of the archipelago (16). Europe is then morphologically bonded to the philosophy of the sea.

The reasons of stressing on the original meaning of Europe and its strong connection to the sea can be clarified in the definition of the modern expression of the Territory as a political technology: indeed, this happens through the very European invention of the tool of the state. The state, or the Leviathan – which is the biblical sea monster – exists as the conscious agreement of distinct individuals to cede some personal freedom in exchange of protection, which is granted by the ruler (17). However, with the rise of nation-states, this original archipelagic condition will be substitute by the homogeneous collective will of the national community, which exercise its power within the very defined boundaries of the Nation. Next to the need for protection, the state becomes a tool to express the collective will of hegemony; moreover, the coincidence of the nation-state with the Territory is invented (18). Territory is the act of bounding a space (19) – land and sea – which is claimed to be national space, thus which can be exploited for the survival and flourishing of the national community.

To conclude, the Territory as political technology is the imposition of a border – which is the tool of division and distinction – to define the collective exploitation of land and sea, with the final aim to grant protection and allow potential hegemony of the (national) community.

1.3.4. The a-Political Territory - Maritimization

As the idea of political Territory is based on the existence of the common will of a collective sphere which finds its expression in the tool of the state, the opposite notion of a-political Territory arises from the positivist potential of a counter-state condition: “a counter-territorial geographical imaginary – a powerfully seductive space that would be free of the political oppression and divisions that territory had inscribed onto the land”. It is a radical shift from the border to the corridor, which finds its background in the notion of *network*, as adopted from hydrological sciences by Saint-Simonian engineer Michel Chevalier (1806-1879), and later by Ildefonso Cerdà, the “inventor” of urbanization (20). The liberal dream of the a-political Territory is based indeed on the concept of urbanization: the superimposition of a grid as tool to allow occupation, division, distribution and exploitation of land – and sea – beyond borders and limits, in an endlessly replicable way.

“Territory could be conceptually overcome and tacitly resurrected as a benign, social technology made to animate a globe of fluid, controlled circulation whose order would be built around a hierarchy of nested scales of private, economic traffic”(21).

13. Schmitt in Aureli, Pier Vittorio. *The Possibility of an Absolute Architecture*, Boston: MIT Press, 2011.

14. Cacciari. *Geofilosofia dell'Europa*.
15. *idem*.

16. Schlögel, Karl. *Archipelago Europa*.

17. Hobbes, Thomas. *Leviathan*, Oxford: Oxford World's Classics, 2008 (first ed. 1651)

18. Elden, Stuart. *Terror and Territory: the spatial extent of sovereignty*, Minneapolis, London: University of Minnesota Press, 2009

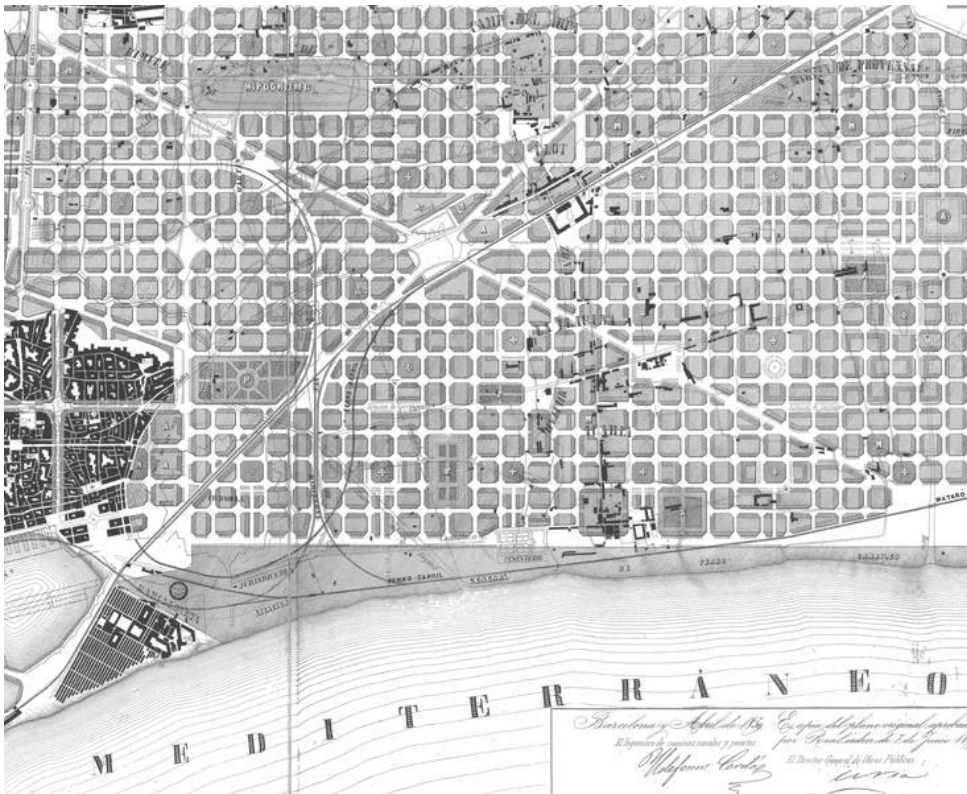
19. Corner, James. “The Agency of Mapping: Speculation, Critique and Invention”, in Cosgrove, Denis. *Mappings*, London: Reaktion Books, 1999, 231-252

20. Adams, Ross Exo. *Mare Magnum: Urbanization of Land and Sea*, Chicago, 2015 and Aureli, *The Possibility of an Absolute Architecture*.

21. Ross Exo, *Mare Magnum*.



Hobbes, Thomas. *Leviathan*, 1651. Frontispice. The will of the community becomes the (univocal) will of the ruler (or the state).



Cerdà, Ildefonso. *Plan of Barcelona (Plan Cerdà)*, 1860. North Section. The grid is potentially expandable everywhere. Urbanization/Territorialization is made possible via (grid) infrastructurization.

This idea of limit-less connections as synonym of (individual) freedom derives directly and explicitly from the previously discussed definition of Sea. Indeed, the sea is the place where the European artificial construction of the state becomes more absurd, in the attempt of claiming its flat context-less surface as precisely bounded national space. However, many could argue the same for the opposite trend: the a-political urbanization as an attempt of maritimization of Land.

Furthermore, two problems arise from the narrative of a Territory as an a-political technology. First, urbanization as cause of the alienation of the modern men from their own world: in an ever-circulating condition, there is no space for pauses, which are the very act to create a place, thus to inhabit (22); and a world which is not inhabitable is not made for men. Second, the rationalization of all the existing, or the risks of the *Ecumenopolis* (23), the planet-wide city. A sort of broadband urbanism - onshore and offshore - which is product of the political ideologies of our globalizing world (24). The lack of limits in a context-less world: what would a condition of all-embracing (master)planning mean for the humankind?

1.3.5. Colonization and Rationalization

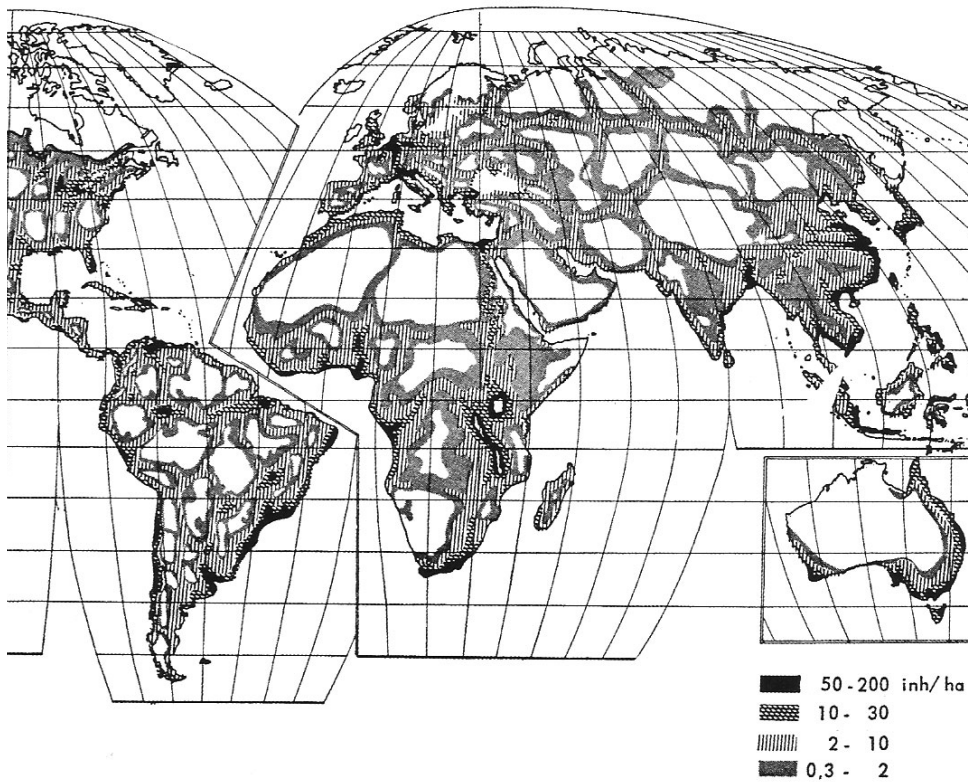
The Territory as a political technology and the a-political Territory are, in fact, two faces of the same topic, which is one of claim, occupation and exploitation: in reality, the political and a-political declinations of a Territory coexist almost everywhere, strongly bonded by their common will of hegemony. Even though the tools are different – and can be shortly summarize in the definition of a border in the political case and the implementation of a grid/corridor in the a-political case – the achievements are similar, reached in both cases through a linear process of rationalization.

Therefore, building a Territory becomes an act of colonization – of a *terra/mare nullius*, in the name of a political or a-political ideology, which is meant indeed as a process of gradual rationalization. Consequently, the initial condition of a geography – land or sea – before the very act of territorialization is assumed to be an irrational one, or all-*Topos*, non-structured by a *Nomos*. From the exploration/experience of the *terra incognita*, to the mapping of the same area in order to establish control, until the imposition of an exploitative order through a (master)plan. This is the – apparently – inevitable univocal path of colonization, or the building of a Territory. It first interested Land, and it is now approaching Sea, in an all-embracing will of rationalization.

This way of thinking is deeply embedded in the modern European *forma mentis*, which tends to put every phenomenon in a progressive path towards an ideal condition, or the *ideal*: even History is conceived as a line (25). However, this ideal end of the line can never be reached, being only a model for the *real*, to which is connected via an asymptotic relation of self-perfecting (26). If this relation is threatened by the overwhelming of one element on the other, there is the risk of a loss of identity, thus of memory (27). When the aim of territorialization becomes the total subjugation of geography – land and water – to the expression of an artificial concept or ideology – the Leviathan or the Network – the original identity of the same geography is violently threatened and replaced by a new narrative, which tends to exclude any memory of previous subjects – being them human or natural; in fact, this is the real definition of colonisation. Moreover, the dictatorial imposition of a new “static” Territory of rationality – and exploitation – enforces a linear process, introducing the potentiality of an end-point, a decline or sunset. But which memory will be allowed to survive after the sunset?

22. Cacciari, Massimo.
“Nomadi in Prigione”, in
Casabella 705, 2002.
23. Doxiadis, Constantinos.
“Ecumenopolis: Tomorrow’s
City” in *Britannica Book
of the Year 1968*, London:
Encyclopaedia Britannica,
1968.
24. Easterling, Keller.
*Extrastatecraft The Power of
Infrastructure Space*, New York:
Verso Books, 2016.

25. On the relation between
modernity and perfection,
Vattimo, *La filosofia e il tramonto
dell'Occidente*.
26. The dualism of real and
ideal as formulated by Kant, in
the work of Chiodo, Simona.
*Che cos'è un ideale Da Platone alla
filosofia contemporanea*, Roma:
Carrocci Editore, 2016.
27. *idem*.



Doxiadis, Costantino.
Ecumenopolis, 1949. The
 world as a planet city, made
 of different scales of clusters,
 networks and corridors.



Cole, Thomas. *The Course of
 Empire: IV - Destruction*, 1828.

1.3.6. Sunset and Memory

Exploration/Experience, Control/Map, Order/Plan, Decline/Sunset: it is the life and death of a geography turned Territory, or the temporal epistemology of a Territory. More precisely, this process represents the recurrent history – or histories – of claim, occupation, division, distribution, exploitation, exhaustion, abandonment, which fits perfectly within the modern European fashion of linear narratives, discussed previously. Which is a *synecdoche* for the European History itself and, by extension, the History of the World. We all are global preys of this system; our societies being trapped in a vicious phenomenon of path dependence from this univocal reading of time. Europe itself is stuck in its own linear vision; it colonized itself and became the very last victim of the Europeanization of the world (28).

28. Spengler, Oswald. *The Decline of the West*, 1923, a concept expressed very clearly by Vattimo, *La filosofia e il tramonto dell'Occidente*.

Two parallel actions are identified as possibility to free our reality and overcome the linear trap. First, the general need to go beyond modern thinking, or a different temporal epistemology of a Territory/the World. Time has not always been linear: indeed, even a sunset presumes the existence of a dawn, which embeds its memory (29). Second, the specific need to go beyond progress as a process of substitution, thus loss. The future Territory must be based on the mitigation between opposite trends – in the form of fair conflict; a perpetual tension of visions. A Territory of interdependent coexistence of memories, which could host both irrational and rational, romantic and productive, anthropic and natural.

29. Cacciari, L. *L'Archipelago*.







1. Territory: North Sea

1.4. On The Sea Condition or The Dichotomy

After formalizing a Temporal Epistemology of the Territory, it is possible to further develop the two main forces – or the dichotomy – within this narrative. The first and most obvious one is the Rational, or the rationalizing will of colonization, as defined in the previous chapter; rationality is meant as the very anthropic imposition on land or sea. The second one is the Irrational, here primarily meant as the still anthropic individual need to explore or evade reality – or the romantic vision of the sea: irrationality as the condition of being beyond those laws which define a territory. In general, the Rational is mainly linked to the already mentioned collective “freedom”, or the need to exploit the territory as a mean of both control and survival - and growth; while the Irrational is in general the other freedom, or the individual possibility to experience a territory beyond the rule of the Leviathan.

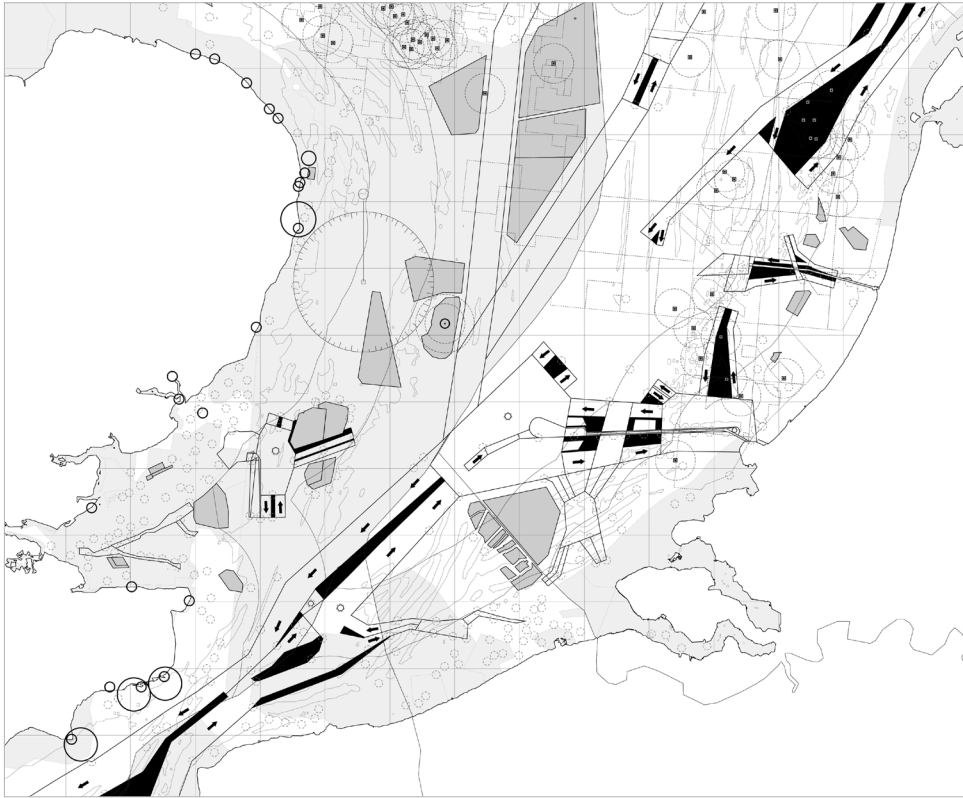
However, both definitions imply the possibility for any sort of anthropic interaction - being it of proper exploitation or of simple exploration. There is in fact a third condition, not only beyond-laws, but even beyond-human, either pre- or post-anthropoc. This condition cannot be defined, as doing so would already be an act of exploration, or even control. Therefore, it will not be included as an active part of the perpetual conflict - the dichotomy - between Rational and Irrational, but it is rather a passive third element, which is however in opposition to the other anthropic two.

A more detailed presentation of this dichotomy will be here proposed. Its existence will be tested on a specific part of the North Sea: the Southern Bight, which is the body of water between Belgium, the Netherlands and the United Kingdom. This choice comes due to six main voices: (a) it is the densest zone of the North Sea regarding ship routes and international trade in general – here lays the ports of Amsterdam, Rotterdam, Antwerp, Bruges, Dunkirk and London – and (b) it is interested by a wide range of resource-related activities – sand dredging, wind exploitation, fishing. It is therefore the area with (c) the most interesting power-scape of the North Sea region – as the Oceanic Project maps proved already – but yet (d) it does not have an official non-technical name – then what about its memory, is it already lost, or is there something beyond efficient exploitation? Finally, (e) it is one of those areas when holidays resorts and the “desire of the shore” in general arose first, and (f) it is one of the most fascinating bodies of water of the region, for both history and landscapes – background of epic naval battles, sublime thunderstorms, foggy beaches and cliffs.

1.4.1. The Rational

The Rational, or the rationalizing will of colonization, exists on a productivist ideal, since the main aim of this kind of rationalization is the economic control and exploitation of the Territory. This act of violent abuse happens in order to secure wealth – or the survival of the islands of power – or, in a more idyllic way, to directly or indirectly grant the satisfaction of collective needs of a certain community – for instance a nation-state, or the Leviathan.

The Southern Bight happens to be one of the densest areas on the North Sea for trade routes, resource extraction, ferry traffic, electricity production, aquaculture zones but also natural reserves - nature under human control: the process of rationalization-zoning of this territory reaches very high peaks, in order to secure adequate space and time to almost every activity, or at least to the most profitable ones. The total master-planning of this area grants high levels of efficiency – even vessels are forced to navigate within specific motorways and around huge ship-roundabouts. However, the water surface and seabed are among the most densely built - or urbanized - in the whole world; moreover, the natural balance of the whole area is dangerously threatened by the ever increasing exploitative activities: most of its wild marine life is extinct by now.



The Southern Bight: international shipping “motorways”, wind farms concession areas, oil rigs, oil rigs concession areas, Natura 2000 maritime protected areas, lights-buoys systems.



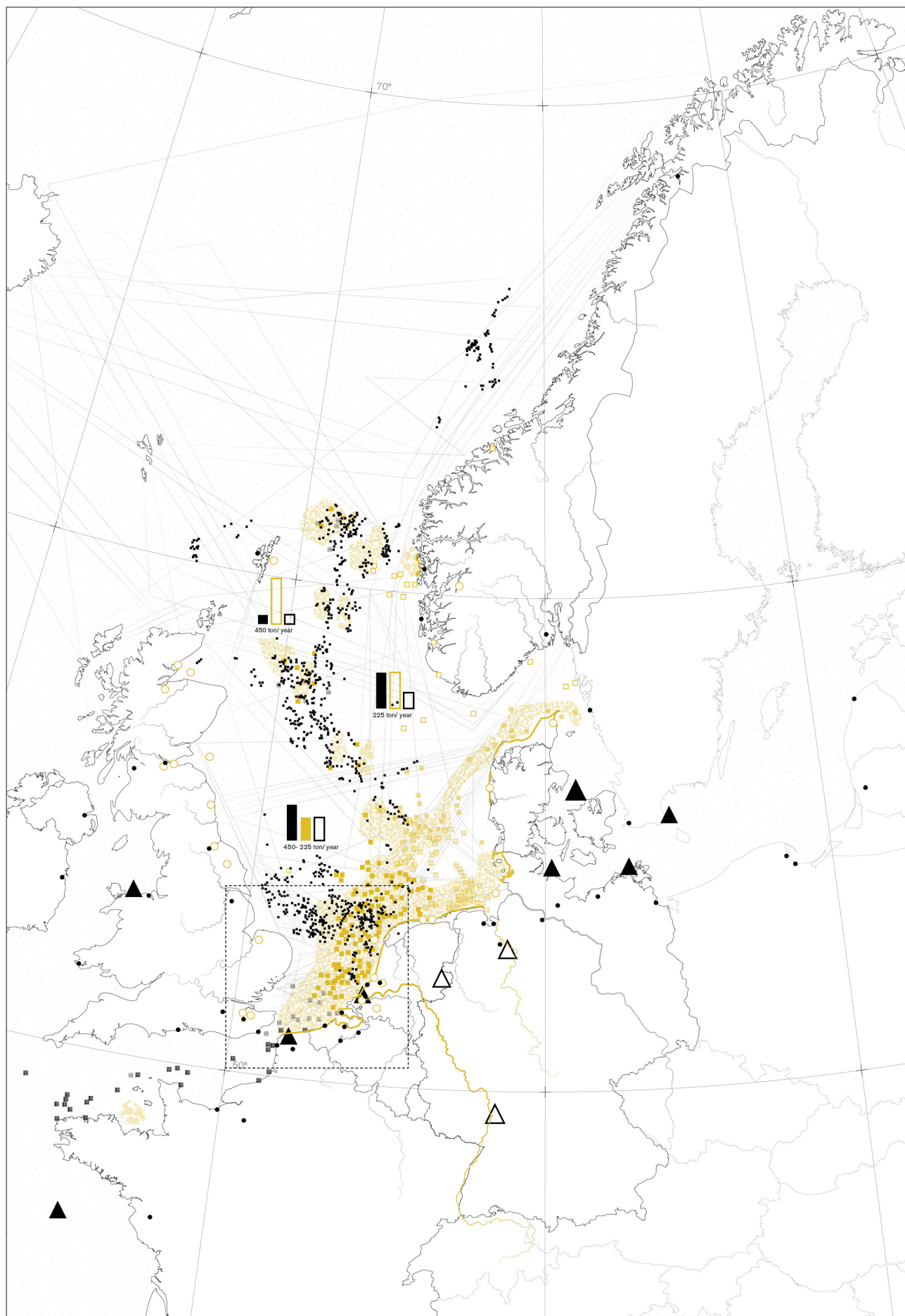
Chesapeake bay's (USA) Oyster Drudging, 1884. This is an act of the American Oysters Wars; however, the same technique was used on the North Sea. Today, no oyster population exists anymore.

Oil & PAH pollution

Risk by Extraction

The following map shows the extension of frequent oil spills that temporarily cover ocean surfaces and subsequently sink in form of hydrocarbons to the bottom and affect marine habitats and substrates. Although accidental, oil spills and exploitations are happen mostly in the south of the North Sea. Polycyclic aromatic hydrocarbons (PAH) are 'are natural components of coal and oil, and are also formed during the combustion of fossil fuels and organic material, for example during activities at an oil refinery' (OSPAR, 2017). Once in the marine environment they become hazardous chemicals.



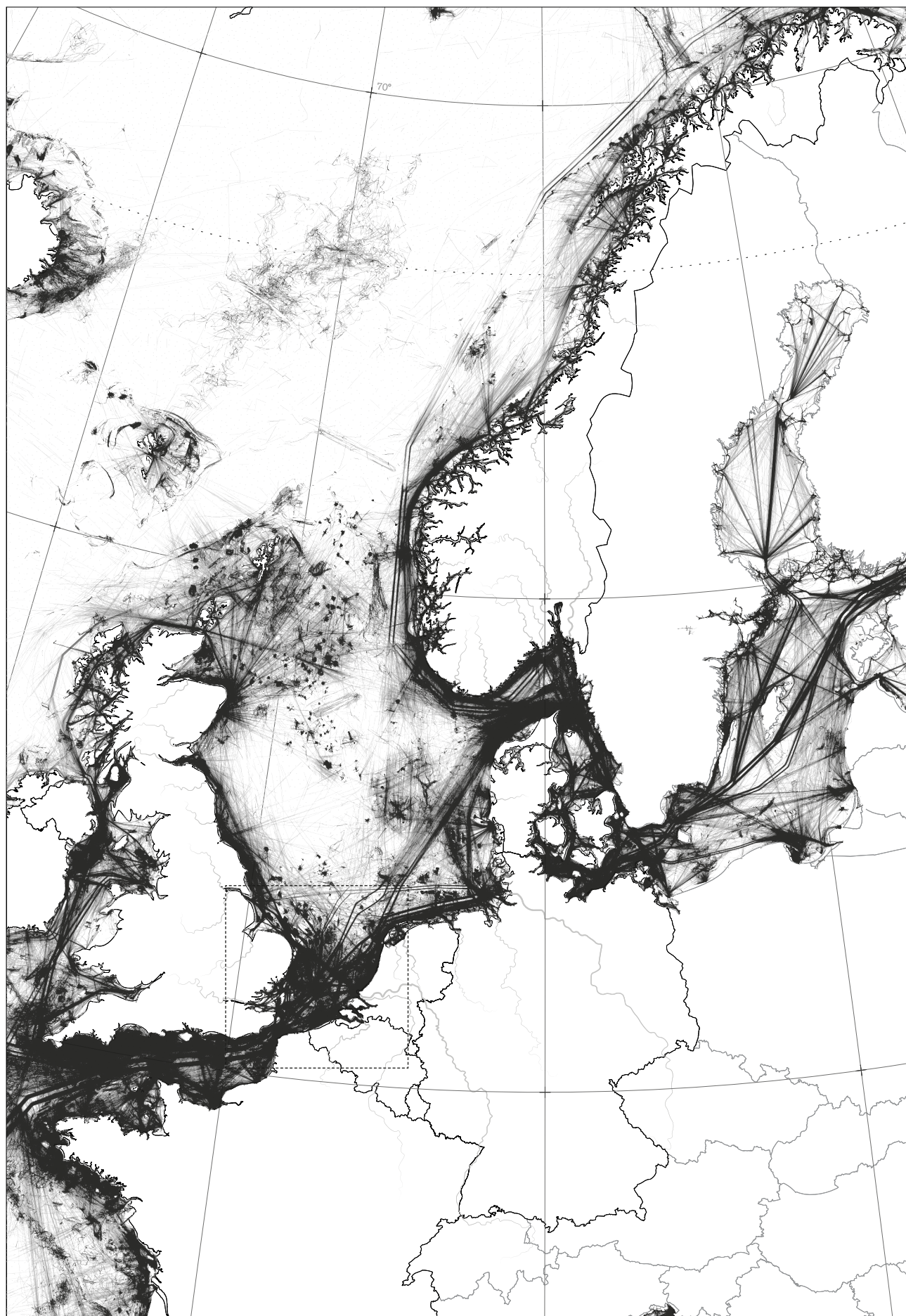


Shipping traffic in the North Sea Risk by Production

The map shows the shipping density in the North Sea during August 2017. Data regarding all types of navigation: cargo, dredging or underwater, high speed craft, fishing, military and law enforcement, passenger, pleasure craft, sailing, service, tanker, tug and towing. As can be seen from the map, the Channel and the Southern Bight are the most critical areas and the most affected by ship emissions.

Navigation is one of the major causes of greenhouse gas emissions in the North Sea. Nowadays in Europe, nitrogen oxide NOx emissions from shipments are around 2.8 million tons per year. Ships, especially merchant ships, release large amounts of CO2 and NOx. The majority of ships are powered by diesel and combustion.

— Shipping routes



1.4.2. The Irrational

The Irrational, or the endemic human need of exploration and evasion, exists on a romantic ideal which envisions the sea as the realm of total freedom - from laws, rules, traditions. If the Rational Territory is a machine - the tool of the collectivity to secure its endless growth - the Irrational one is human experience, as the tool of the individuals to exist beyond given established rituals. Both perspectives have crucial roles in the definition of a territory, thus in the possibility to inhabit it and survive or resist in it, despite any sort of extra-anthropocentric or natural interference. One is pragmatically focusing on perpetual adaptation, providing the tools to control and exploit all the surroundings; the other works with creating imaginaries and protecting memories, to challenge the same notion of territory, while reminding its endemic ephemeral nature - as a technology produced by ephemeral beings. If the Rational sets the objectives, tending towards the modern definition of endless perfect progress, the Irrational seeks to create questions, and to explicit the imperfections and limits of the human condition.

The Southern Bight is turning into the most Rational territory: a perfect and efficient machine. The territorialization trends appear in an even harsher way on the Sea, where there is no immediate context to take into consideration, or to preserve, being it a temporal and dynamic context; and where there is no simple possibility of opposing the imposition of the Leviathan's rule. Is the North Sea going to become the subject of the most totalitarian regime on the planet? The romantic imaginaries of another possible territorial narrative are needed. Besides the memory of mighty sunsets, foggy mornings and terrific storms, a political act is needed, to underline the need of preserving the maritime right to be free. The last romantics to navigate these waters, radio pirates, challenged the overwhelming power of the nation-states. What does it mean today to live the sea beyond laws - or even beyond human?

1.4.3. The Sublime

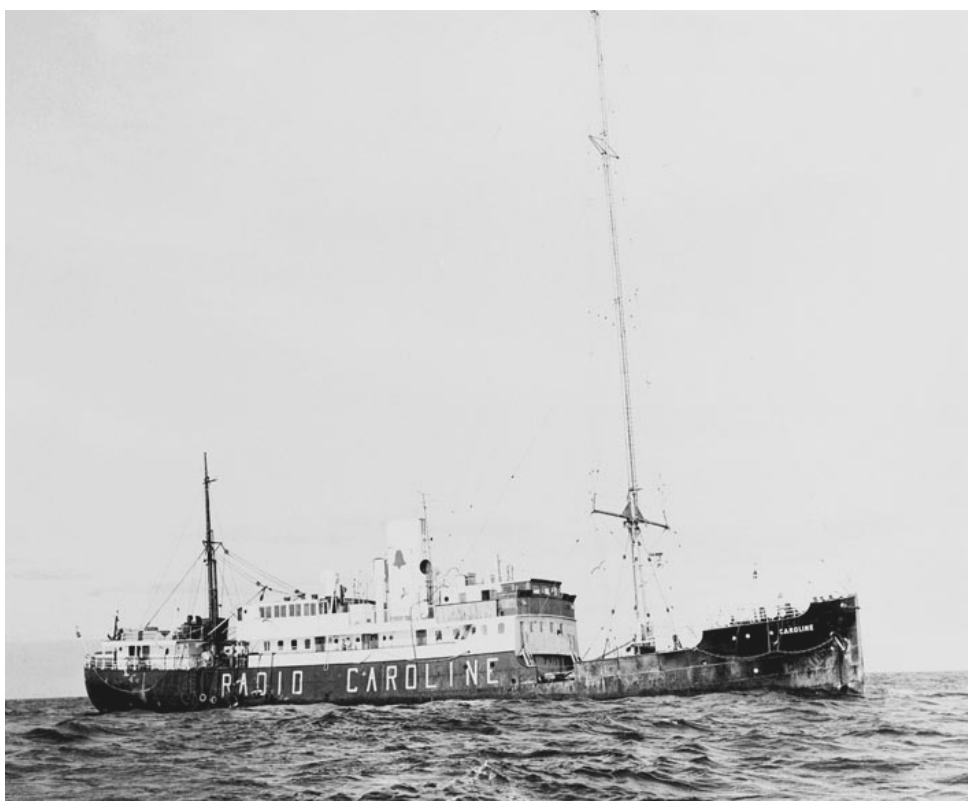
The total urbanization of the Sea seems to be inevitable.

Sea territorialization means a great opportunity to freely colonize and exploit - under the undisputed despotic rule of a totalitarian Leviathan - far away from the eyes of the collectivity, yet for its own benefit and growth, thus without any real active opposition. Sea territorialization is the death of the Territory as a conflict-coexistence of opposites: there is no need or possibility for confrontation, only a *terra/mare nullius* put under control. However, the total anthropization of the Sea would mean a long-term defeat for humankind, as the very definitive loss of the space of freedom *par excellence* - thus, perhaps, of freedom itself. Moreover, the pride coming from this false dream of endless advancements might prove to be dangerous.

Therefore, a compromise must be researched, and coexistence should still be achieved. Besides anthropic laws and impositions, the context of the sea is, indeed, still dynamic and temporal, of an ephemeral nature. The harsh tension between opposites - Rational and Irrational - still exists, even though its definition changes constantly. In general, this perpetual confrontation can be best expressed by the notion of the sublime: of the terror of nature and the fear of an endless horizon, of the bigness of the mass, of the strength of human ingenuity and the power of the machine. The sublime happens when the blurred edge between Rational and Irrational is crossed, or challenged. In their definition through their edge(s), new visions and imaginaries can be proposed.



Turner, J. M. William. *A Coast
The Shipwreck*, 1805.



*Pirate Radio Caroline in the waters
between the UK and the Netherlands*, 1964.



*Pirate Radio Sutch, offshore
headquarters in the squatted Red
Sands Forts, Thames Estuary
(UK), 1964.*



*Pirate Radio Veronica, or Vrije
Radio Omroep Nederland, Dutch
North Sea (NL), 1960.*



*Drangen Oil Field and Platform,
Shell - AS OKEA, Norwegian
North Sea (NO), 1993.*



Horns Rev Offshore Wind Farm,
Danish North Sea (DK), 2009.



*Maersk Marseille Containers
Vessel, 399x58.6m, 19630 TEU,
Copenhagen (DK), 2018.*



P.W. Alastair, *Maersk Triple E*,
Okpo (KR), 2014.
source: Atlas of Places



C. Schulze, *State of Nature*,
Dover (UK), 2014.
source: *Atlas of Places*



C. Schulze, *State of Nature*,
Oosterscheldekering (NL), 2014.
source: *Atlas of Places*



M. Vitali, *Piscinao de Ramos*,
(BZ), 2012.
source: *Voluptas Arsenal*



M. Vitali, *Viareggio*, (IT), 1999.
source: *Voluptas Arsenal*





D. Beltrà, *Spill*, Development
Driller II platform, Gulf of
Mexico (US), 2010.
source: Atlas of Places

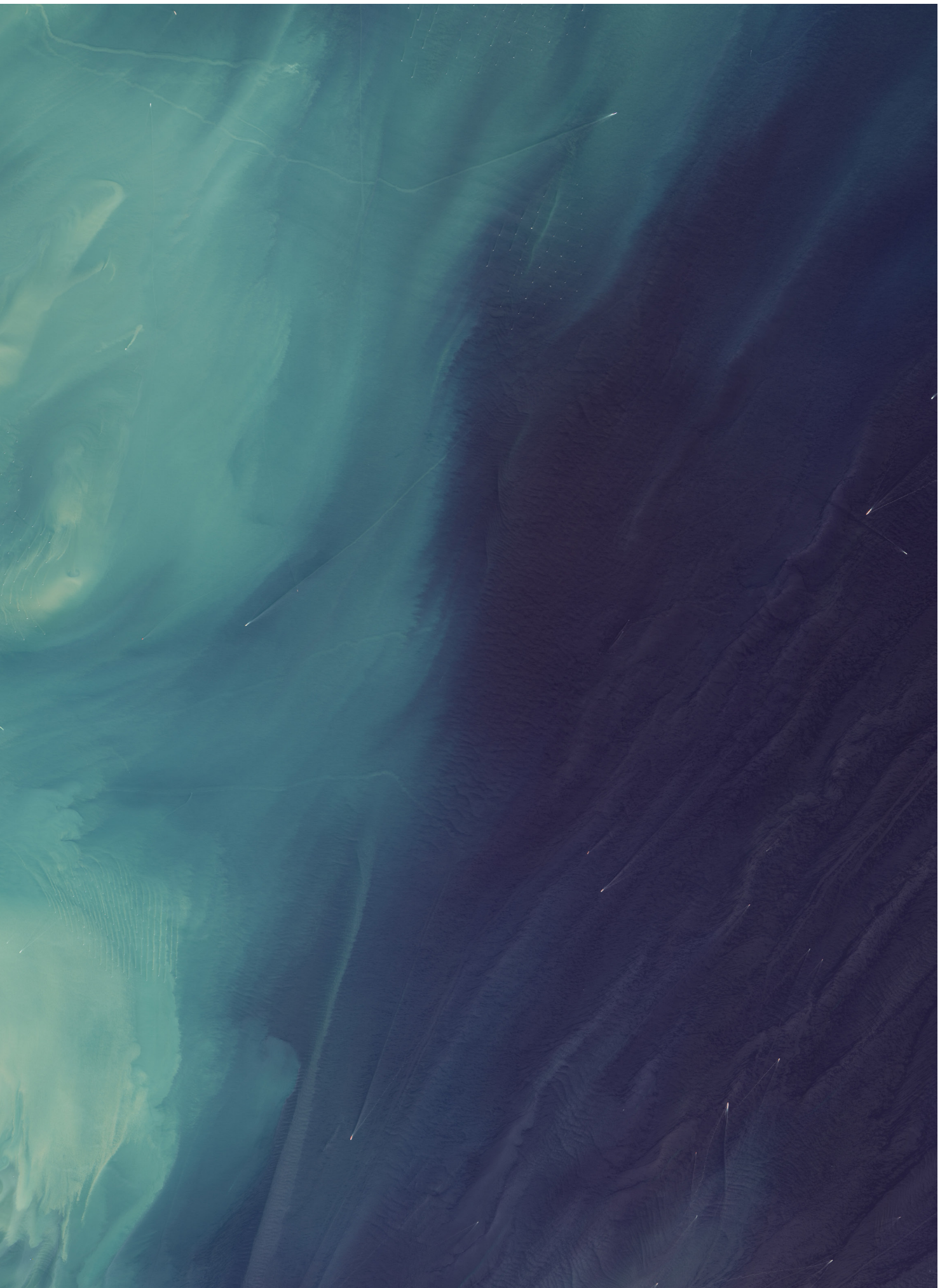


G. Galtruccio, *For Your Consideration*,
Geiger Sea, Los Angeles (US), 2017.
source: *Atlas of Places*



G. Galtruccio, *For Your Consideration, Mission Accomplished*, Los Angeles (US), 2017.
source: *Atlas of Places*







Horizons:
Productive Sea
or Romantic Sea?

In the previous page: NASA Earth
Observatory, *Offshore Wind
Farms Make Waves*, Thames
Estuary (UK), 2015

1. Territory: North Sea

1.5. Problem Statement and Research Question

There is the need to open a new discussion on the wider notion of Territory and its real ontological meaning. The coexistence of opposites – a productivist will of exploitation and the romantic ideal of exploration – has often been controversial, but yet has always existed; however, present times show a real threat to break this dualistic relation, with one element – in this case, the Rational – pretending to overwhelm or even deny its opposite. What is the aim of the total colonization of all the existing?

This process of constant advancing territorialization cannot be stopped: *hybris* is in human nature. The tool of the territory is too embedded in our linear conception of time, it is our way to interact with our surroundings, the tool through which the world has been built as we know it. However, it is necessary to accept the ephemeral condition of this process, to avoid thus the loss of our romantic perspective on the world. The definition of the relation between Rational and Irrational - the Sublime - must be unveiled, in order to protect their dichotomical condition, their interdependence, the benefit of their balanced coexistence.

The North Sea is probably the place where sea territorialization trends appear with the deepest intensity: it is indeed the most recent new frontier of territorialization – and the first one of the new global urbanization phase, which is now interesting the sea after having consumed all the land. It has been under extensive actions of exploration in order to detect its multiple resource deposits; decades of political claiming and cultural occupation have occurred, and phenomena of massive economic exploitation have intensified vertiginously, getting closer to the final horizon of an environmental collapse; certain areas of the North Sea – and the Southern Bight most of all – are so dense of traffics, activities, cables and platforms that any sort of movement had to be strictly regulated, and put under the despotic undisputed rule of the nation-states; pollution is beyond the imaginable. And then, this hyper-aggressive and violent process of territorialization happened regardless of the dynamic and temporal condition of the sea, or of the memory of its ephemeral nature, denying the very peculiar condition of being *on* the sea.

It is the time to build a new irrational narrative of the rational Sea Territory.

Is there still space for a Romantic dream of the Sea besides its definition as Productivist Territory? And if so, how is it possible to combine these two opposite visions - the Productivist and the Romantic - in order to create awareness of the dichotomy - and avoid the denial of their necessary coexistence?

Sub-questions

1. *What is Romantic and what is Productivist today?*
2. *How can the realities – and the memories – of the Romantic Sea and the Productive Sea coexist?*
3. *What will the sea horizon look like in the future? Which awareness of which territory will derive from it?*





1. Territory: North Sea

1.6. Spatial Epistemology of Territorialization

1. Calvino, Italo. *Le città invisibili*, Torino: Einaudi Editore, 1972 (Eng. vers. *Invisible Cities*).

2. Koolhaas, Rem. *Delirious New York: A Retroactive Manifesto for Manhattan*, Oxford: Oxford University Press, 1978.

“Memory’s images, once they are fixed in words, are erased” (1).

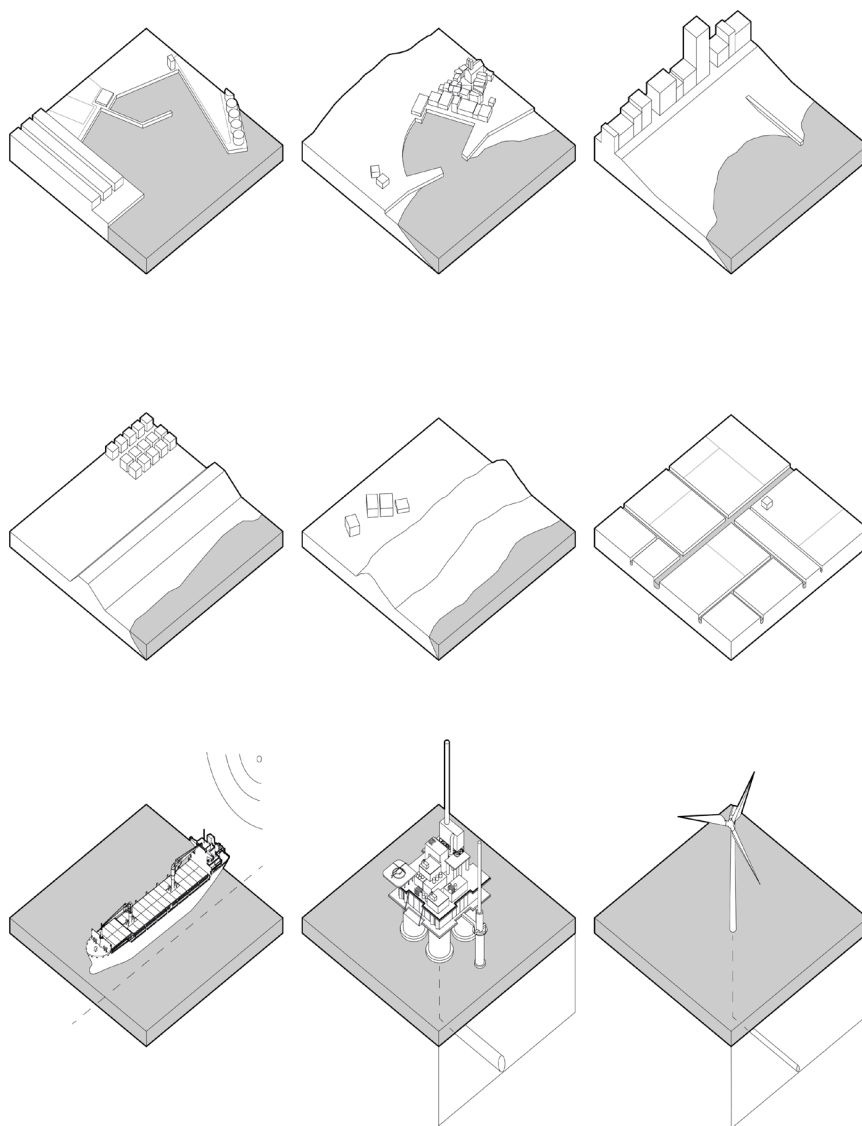
To build an Epistemology of the Spatial Territory of the North Sea means to detect which physical elements hand down the real essence of its memory – or identity, even after it will transform into something else, or it will eventually be gone. Here lies the key to envision a future in which it is still possible to recognize certain everlasting shapes, values or symbols – memories, indeed, which prevent the threat of a loss of identity. In the attempt to define a brief “unformulated theory” – or “retroactive manifesto” (2) – of the North Sea, a collection of elements has been formalized as specificity of this maritime Territory, thus trying to synthesize a notion – a principle which might express its essence.

Even though most of the North Sea is anthropized - or even urbanized - the most suitable place to look for these elements seemed to be the coast. Here is indeed where land and sea meet, then where the existence of the sea is unveiled to most of the people, and thus where most of the human *memories* of the sea lie. Then, a typological comparison has been carried out, mainly trying to understand how humans have constantly tried to transform the very original relation between land and sea, and to put it under control while however destabilizing their primordial balance. It seemed necessary to define a “typology of territorialization”, or a physical expression of the projection of the linear narrative of rationalization from land to sea.

Therefore, the typology of the Pier. The Pier is generally defined as the imposition of a human will - or desire - on sea through the physical transformation of the coast.

But, specifically, *what is a Pier?*

In the next pages a morphological analysis of the typology of the Pier - as defined previously - is presented. The aim is to scan the world coastlines to find an adequate specific definition, finally to be applied to the specificity of the North Sea.

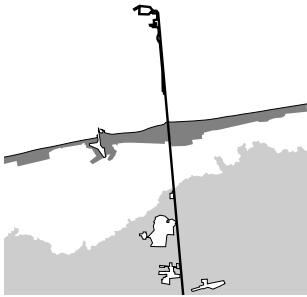


A: the open-coast:
the Harbour, the Fishing
Village, the Holidays Resort.

B: the closed-coast:
the Dike, the Dune,
the Reclaimed Land.

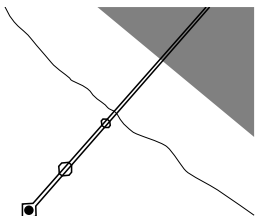
C: the deep sea:
the Boat-Vessel (and GPS)
the Extracting Infrastructure -
oil rig (and pipeline),
the Harnessing Infrastructure -
wind turbine (and cables).

1.6.1. Collection of Elements: Piers



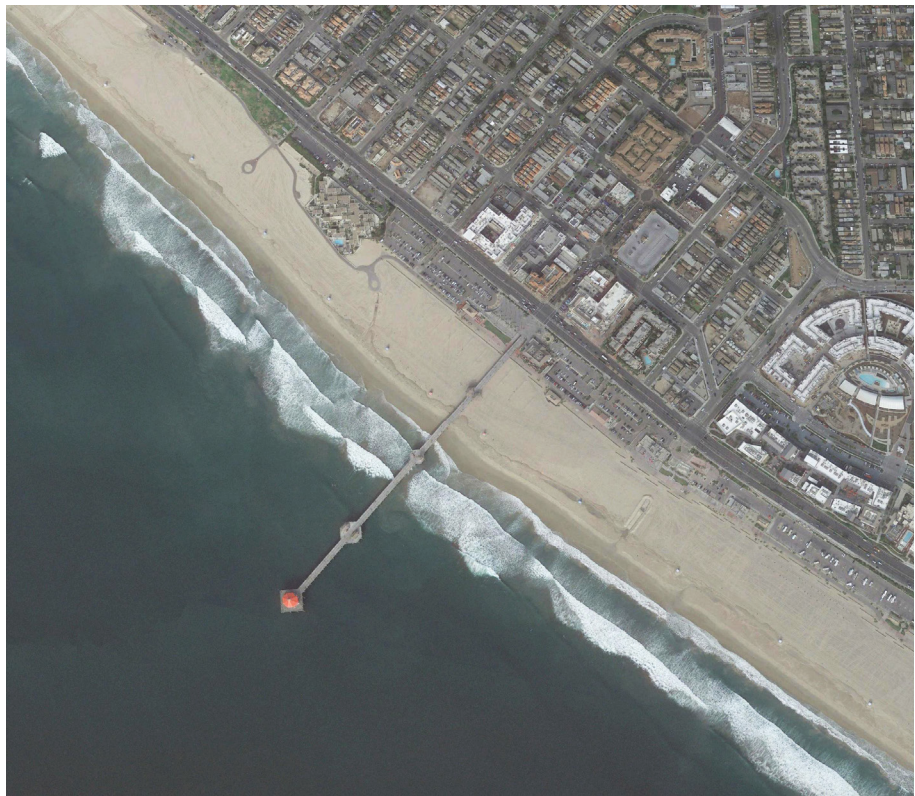
1. A raised platform built from the shore into a body of water, used to secure or provide access to ships.

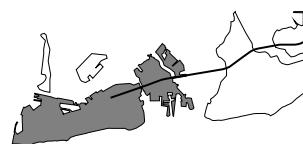
Progreso's Prolonged Pier, Yucatan (ME), 2019



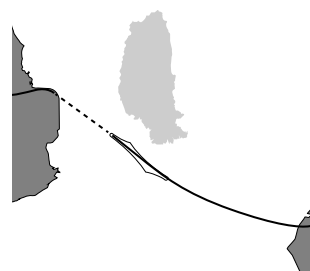
2. A raised platform built from the shore into a body of water, used to provide entertainment.

Huntington Beach, Los Angeles, California (USA), 2017

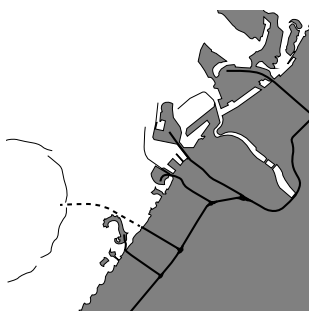




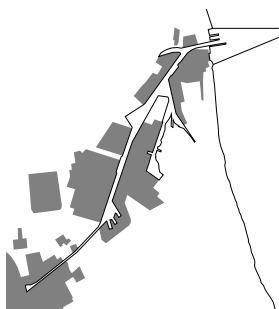
3. A structure projecting from the shore into a body of water.
Key West,
 Florida (USA), 2016



4. An infrastructural intervention projecting from the shore into a body of water.
Great Copenhagen Area,
 (DK-SWE), 2015



5. An infrastructural intervention making the perception of the water-scape change.
The World Islands, Dubai, (UAE), 2015



6. An infrastructural intervention making the perception of the land-scape change.
Marina di Ravenna, Ravenna Emilia-Romagna (IT), 2015





7. The Archetype of the relation between water and land - or the imposition of land on water.
Venice Lagoon, Venice, Veneto (IT), 2016



Typologies of Pier:
 1. The Canal
 2. The Peninsula
 3. The Connected Island

North Sea Specificity

From local to global, to local again. The identification of the typology of the Pier was possible only due to an analysis of the endemic elements of the North Sea. Thus, an astraction/generalization was possible, to find a global definition of the typology of the Pier, which could then be applied to the whole world: the North Sea as mirror of every sea. Finally, it is necessary to come back to the origins: the newly defined typology of the Pier as it appears in different environments/coasts of the North Sea.

A. Dutch-Flemish Piers

Afsluitdijk (NL), 2015
Scheveningen (NL), 2018
Bankenberge (BE), 2015

B. Claims of the Sea

Zeebrugge (BE), 2015
Noordoostpolder (NL), 2016
Rotterdam Port (NL), 2016

C. Island Piers

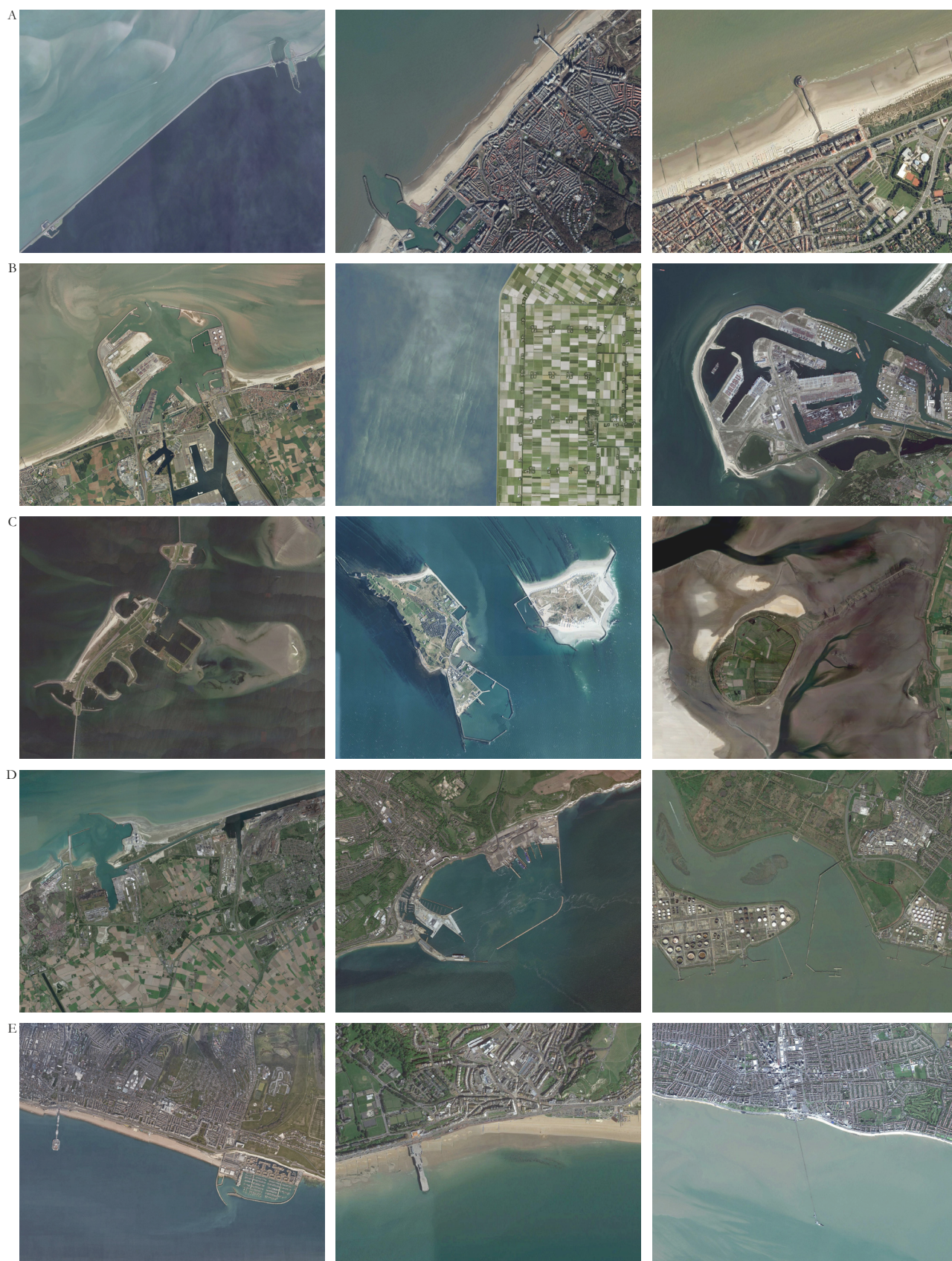
Werkeiland (NL), 2014
Helgoland (DE), 2008
Mando (DK), 2018

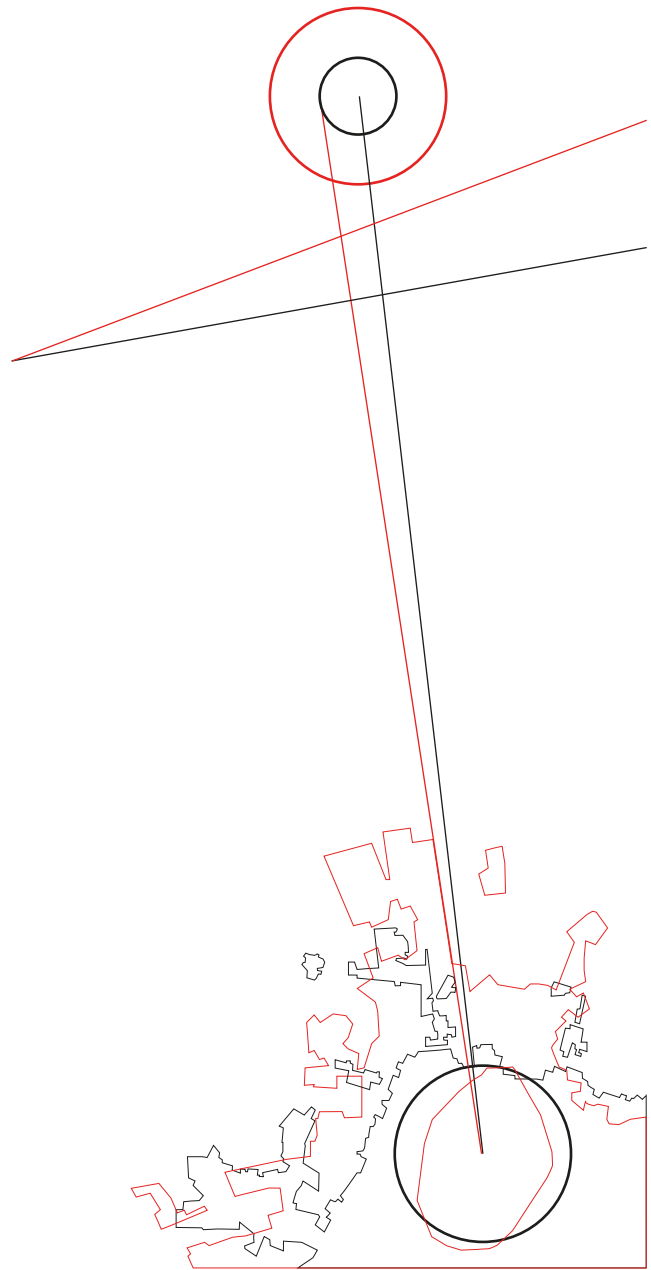
D. Dock Piers

Dunkirk (FR), 2016
Dover (UK), 2019
London Gateway (UK), 2017

E. British Piers

Brighton (UK), 2015
Hastings (UK), 2018
Southend (UK), 2011





Design site

A final step is made towards the definition of a design site on the North Sea. The typology of the Pier has been deconstructed in its essence: the projection of a “line” (the anthropic desire-will) from Land to Sea. The North Sea location which is believed to mirror this condition in the harshest way is found around the Flemish Coast, between the city of Bruges and the port of Zeebrugge: here, this phenomenon of projection (rationalization and territorialization) is most explicit, the sea penetrating land, and vice versa.



NASA Earth Observatory, *Progreso's Prolonged Pier*, Yucatan (ME), 2019 (left) and Google Earth, *Brugge and Zeebrugge*, Flanders (BE), 2015 (right)





2.
SITE:
**FLEMISH
COAST**

2. Site: Flemish Coast

2.1. Target Site: Bruges, Blankenberge and Zeebrugge

This chapter will focus on a site analysis – through different scales – of certain chosen segments of the Flemish Coastal Region (FCR), a 10-20 km wide reclaimed lowland – between 2.5 and 5.5 m above the sea level – which stretches for 65 km from the French to the Dutch borders. The analysis will first focus on the eastern part of the coast, then zooming on a strip of about 40x8 kilometres, which includes the previously mentioned locations of Bruges, Zeebrugge and Blankenberge, among other municipalities. Here, the “pier condition” will be tested.

The starting point of this analysis lies in the controversial relation of the FCR with two different kinds of water(s). Lately, the already mentioned strip will be analysed by morphological and functional means, in order to better understand all the different fronts – or edges, limits, borders – which characterize the area.

The FCR has an impelling problem with water, or better with waters. Indeed, two different kinds of water are today threatening the area which, in the worst-case scenario, could potentially be abandoned because of the lack of basic needs to sustain inhabitation.

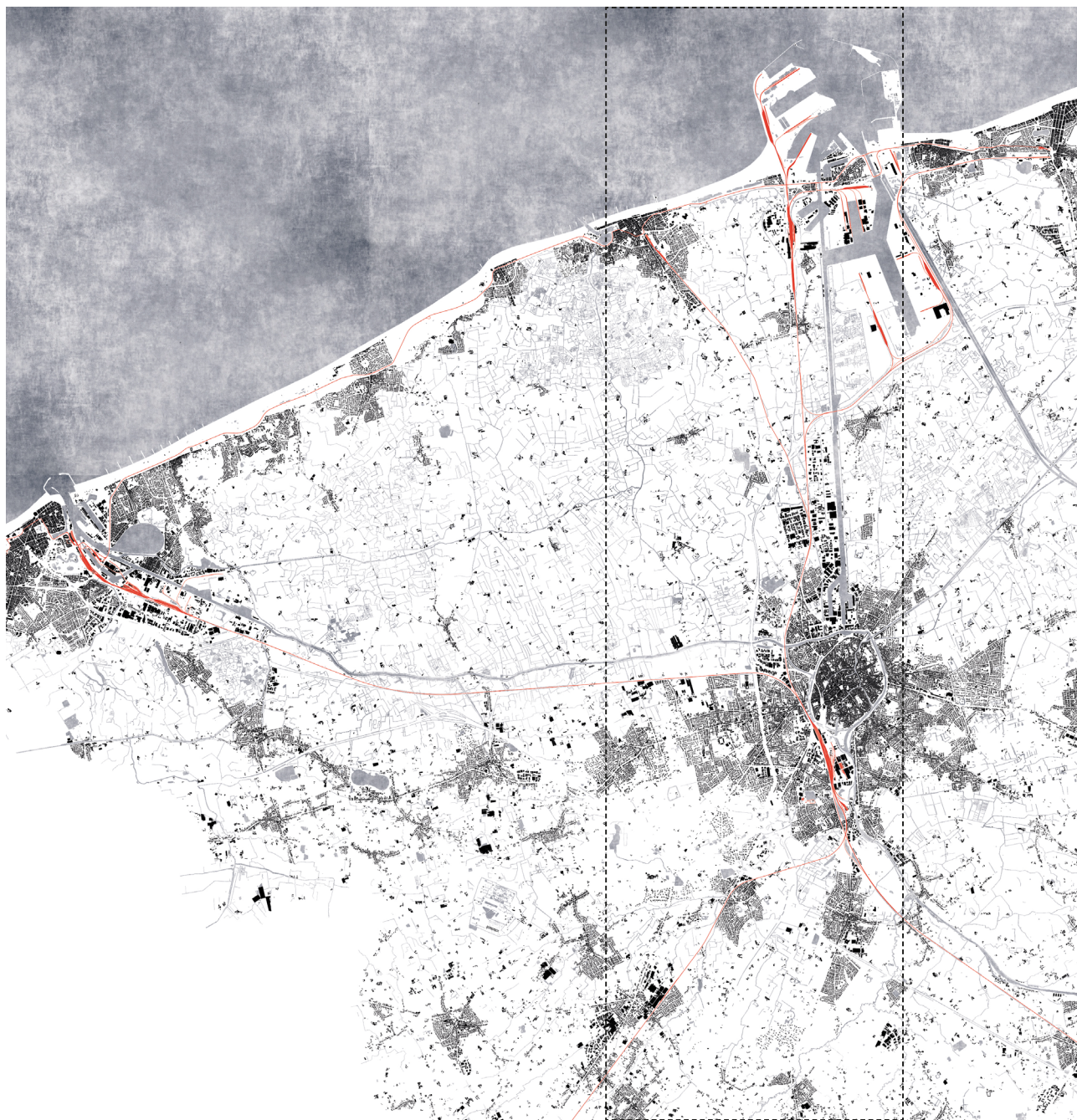
First, sea water. An historical analysis of the FCR coastal transformations is necessary to understand the choices which lead to the current path dependence condition towards the “hold-the-line” principle of coastal protection. The Flanders was a region once abundant of biologically rich-marshlands thanks to a very dynamic tidal system: this condition allowed not the inhabitation of the shoreline – which expressed a very low rate of occupancy until the 19th century – but the economic exploitation of the area, very convenient for the sheep-wool and cloth industry. However, several natural and anthropic processes brought the awareness of the need to artificially keep the dynamism of the shoreline under static control, thus a gradual engineering action of coast “polderisation” began, with the consequential loss of the very peculiar transitional brackish landscape of wetlands between land and sea (1). Today, the dikes area – which became much more valuable than the land which is meant to protect, as will be shown later – is threatened by sea level rise as well as an increase in flooding risk due to an ongoing expansion of the gap between tidal extremes. Several actions have been undertaken by the Flemish government to strengthen the defences of the FCR.

Second, fresh water. Due to an unfortunate match of natural conditions – the wideness of the Scheldt river basin, the soil composition thus the lack of groundwater, the natural brackish character of local streams – the FCR is to be officially defined as a water-scarce region (2); this, among others, is the reason why it remained almost uninhabited for most of its history. Therefore, the high levels of urbanization of today are sustained only by a constant transfer of water from other areas: this goes against the IWRM (Integrated Water Resources Management) principles of self-sustainability (3) – or natural balance without human interference.

1. A lucid analysis is carried out in De Sutter, Renaat. Van den Berghe, Karel. “The governance dilemma in the Flanders coastal region between integrated water managers and spatial planners” in *Water International* 39:6, 2014, 858-871

2. FAO. *Review of world water resources by country*, 2003. Rome: Food and Agriculture organization of the United Nations.

3. GWP. *Integrated Water Resources Management Technical Advisory Committee Background Paper Number 4*, 2000. Stockholm: Global Water Partnership.



*Rail network, water infrastructure
and built environment of the
Eastern Flemish Coast (BE) from
Oostend to Knokke-Heist, 2019.*









2.1.1. Water Analysis

1.

Protecting the region from sea-water

“De kust is een goudmijn die op ontginning wacht” – King Leopold II (half XIX century; “the coast is a gold mine waiting to be explored”). The potential of the Belgian coastline as the beating economic centre of the whole region - due to both tourism and harbour-related activities - was already clear two centuries ago. Since then, several actions have been undertaken to exploit this potential, and today the whole coastline appears as a wealthy continuous stripe of crowded touristic towns and densely inhabited trade centres.

However, the sea itself is now threatening the whole territory, mainly due to the increasing frequency of storms - probably connected to the general climate change phenomenon. The Vlaamse Baaien project - from a collaboration between many private, public and civic stakeholders - aims to protect the coast from the strongest storm waves, while providing new valuable land for touristic and economic developments. A “new front-line/coastline” is proposed to protect the existing one; an approach which is not new to the region.



Vlaamse Baaien Project, 2020.
 The main idea is to create a new coastline - or a new front - to break the strenght of storm waves and then to protect the existing touristic town-stripe.

1.

Getijdengeul, 500 AD.

A natural canal connects
Bruges (Brygge) to the Sea.



2.

Sand Cover Up, 1000 AD.

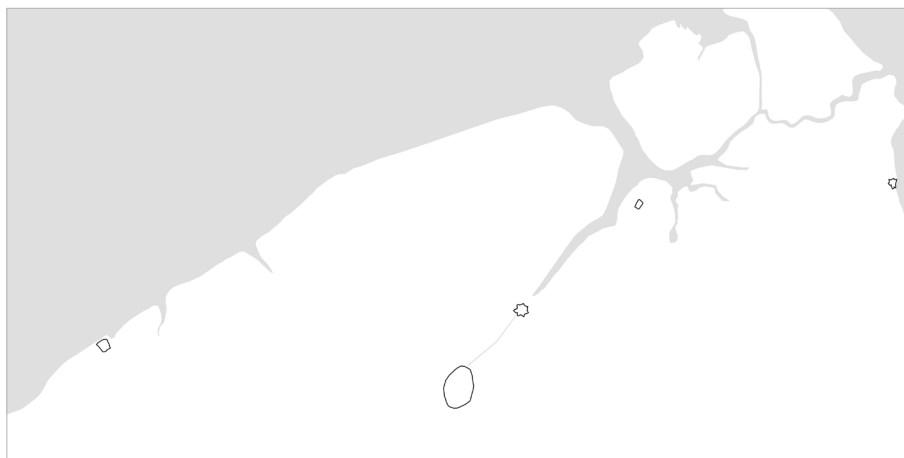
Bruges obtains the status of
City, but loses its direct
connection to the North Sea.



3.

Het Zwin, 1134 AD.

A storm opens the canal of
Het Zwin, and a dike is built
in order to stop the water at
Damme, the new direct port
access of the City of Bruges.



4.

Sluis, 1500 AD.

Het Zwin naturally covers up
gradually, and the main access
moves from Damme to Sluis.

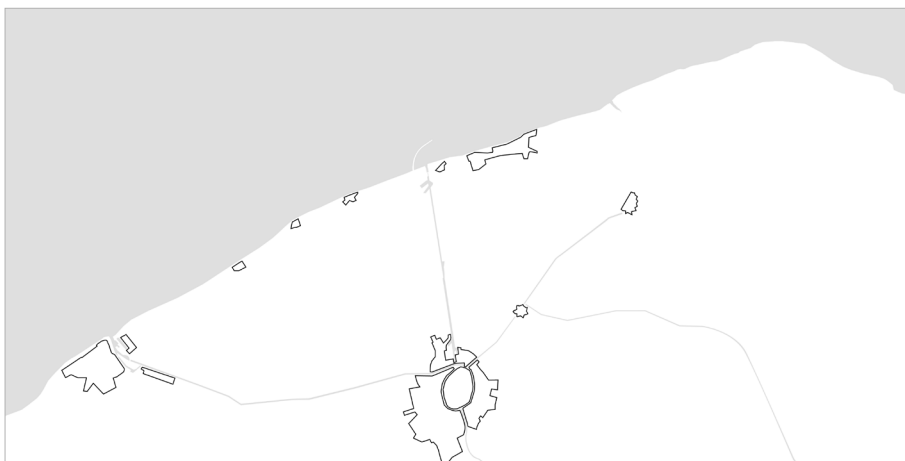




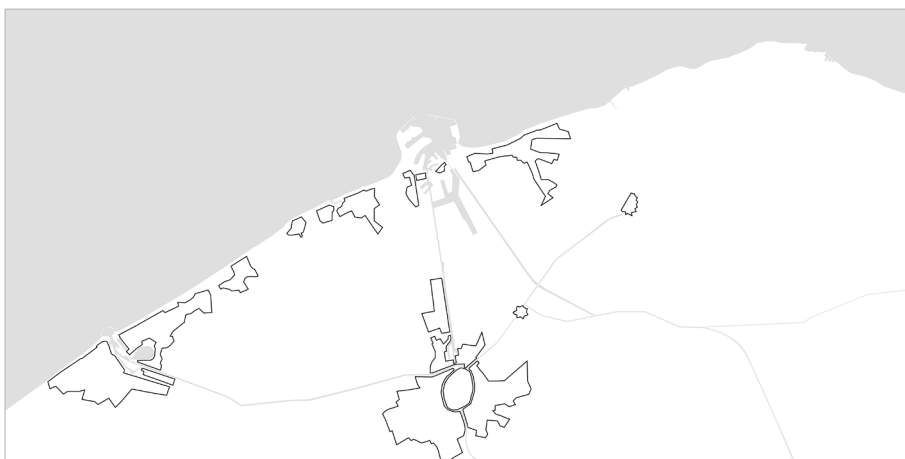
5.
Nieuwe Canaal, 1600 AD.
The construction of the canal Ostend-Bruges-Ghent tries to revive the declining City.



6.
Bruges la morte, 1850 AD.
Napoleon orders the construction of a new canal, which will not be completed. The poet G. Rodenbach describes the city as bled to death.



7.
Baudouin, 1895-1905 AD.
A Canal is built and the Zeebrugge Harbour becomes the new direct connection to the Sea.

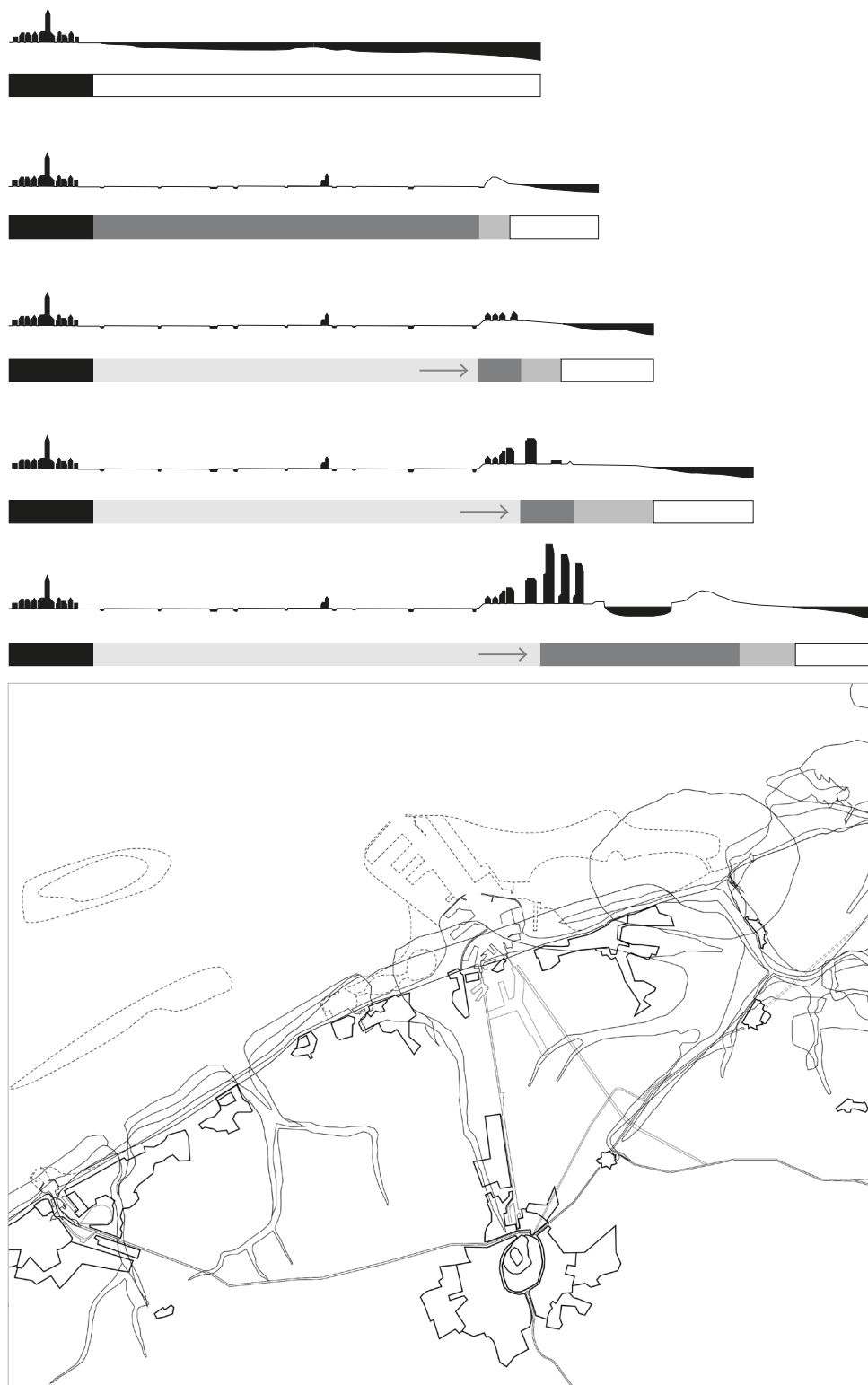


8.
The cost is a gold mine, 2020 AD.
The touristic towns on the coast became the very economic heart of the region.

Territorialization as Colonization

This historical sequence of anthropic advancements underlines a process of gradual land-claiming and coast-sea exploitation. It is the explicit shape of the territorialization process as colonization, defined within the research premises as the very act of territorial formation: the linear narrative of anthropic rationalization upon the irrational dynamic condition of a de-territorialized nature. What is left behind by this ever-advancing process, is only exhausted unproductive land.

The FCR is stuck in the process. Now, in answering the urgent issues coming from the same ephemeral condition of the region itself, the inhabitants can only persevere the same advancement principles. Therefore, the Vlaamse Baaien proposal lies within this logic of perpetual growth, potentially becoming the furthest outpost of land on sea.



*The Eastern Flemish Coast (BE)
as a sequence of actions of land will
projection and physical advancement;
what is left behind is only unproduc-
tive exhausted land.*

*The Eastern Flemish Coast (BE)
from Oostend to Knokke-Heist,
temporal juxtapositions.*

2. Providing the region with fresh-water

Besides the sea-water issue, there is another water-related problem which undermines the survival of the region as an anthropic outpost: fresh-water. Due to an unfortunate series of natural condition, the region has always been a water-scarce one. On one hand, the very wide basin of the river Scheldt attracts most of the water, leaving to the FCR only few weak seasonal waterstream - such as the Lys. On the other hand, the region has always been a transitional point between sea and land; in fact, it was once characterized by the widespread presence of fertile brackish marshlands, which then prevented the formation of fresh groundwater reservoirs - specifically also due to the soil types and composition.

However, the region has been reclaimed from sea, and is today a very densely populated one; yet, there are almost no sources of fresh-water, and the soil is suffering of salt intrusion and topsoil salinization phenomena. Therefore, a complex system of canals has been developed, in order to transport water from the Scheldt - and the Walloon region - to the coast.

A. Topsoil salinization and waterways management.

In red, the artificial canals and their water-flow directions; the pattern shows the areas suffering of salt intrusion and topsoil salinization.

B. River basins

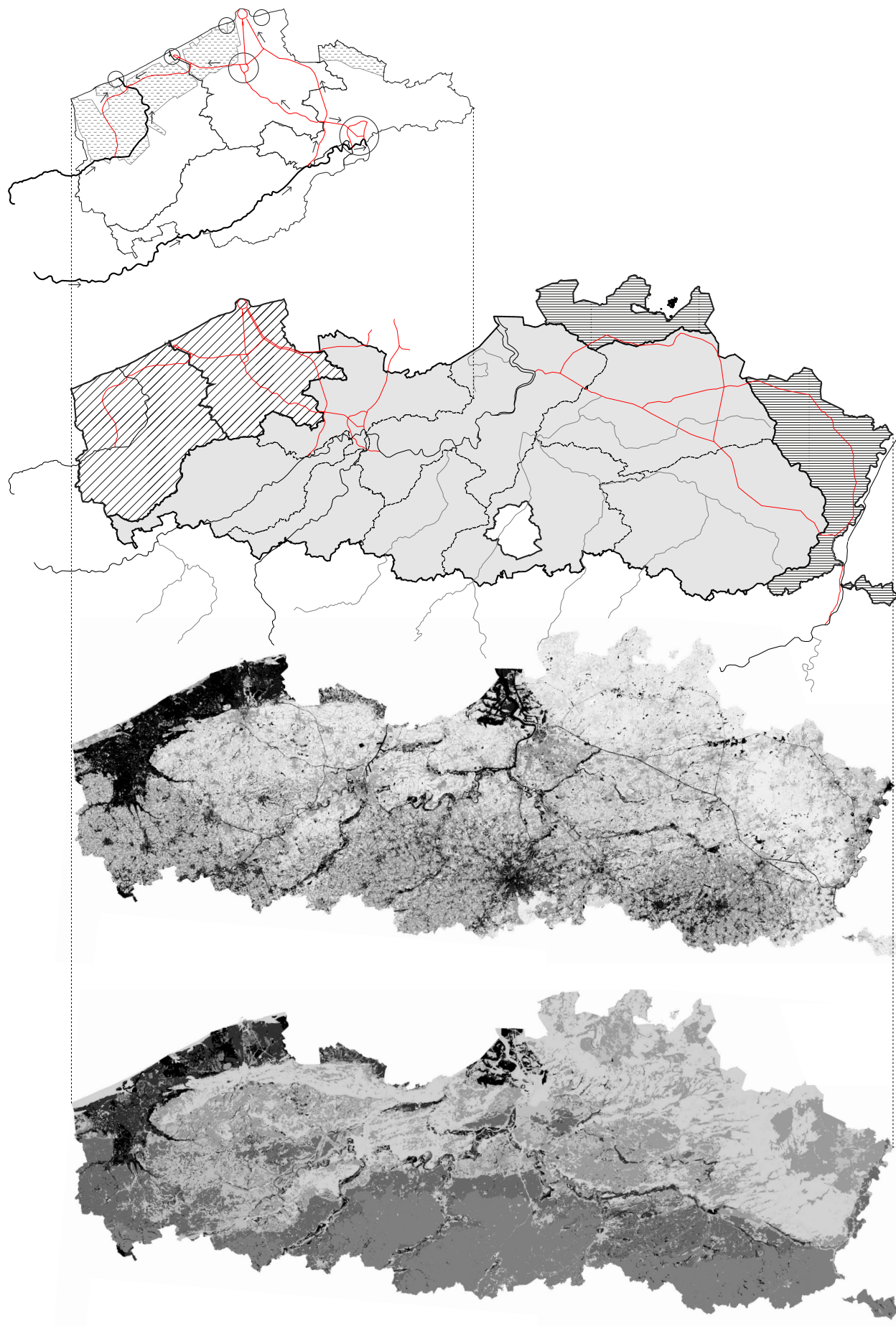
Left to right: the Lys Basin, the Bruges Polder Basin, the Scheldt Basin, the Mense-Maas Basin.

C. Groundwater availability

The darkest the area, the less water is available. Black areas have a negative groundwater index.

D. Soil composition

In black are the clay and clay loam soils.



Tourism

Wide sandy beaches, long sea-side promenades and leisure piers: the coast is increasingly becoming a famous touristic desination for both Belgian citizens and international tourists. Numbers on the touristic presence in the area are constantly growing, together with the average temperature of both land and sea. The FCR could only benefit from global warmer temperatures.

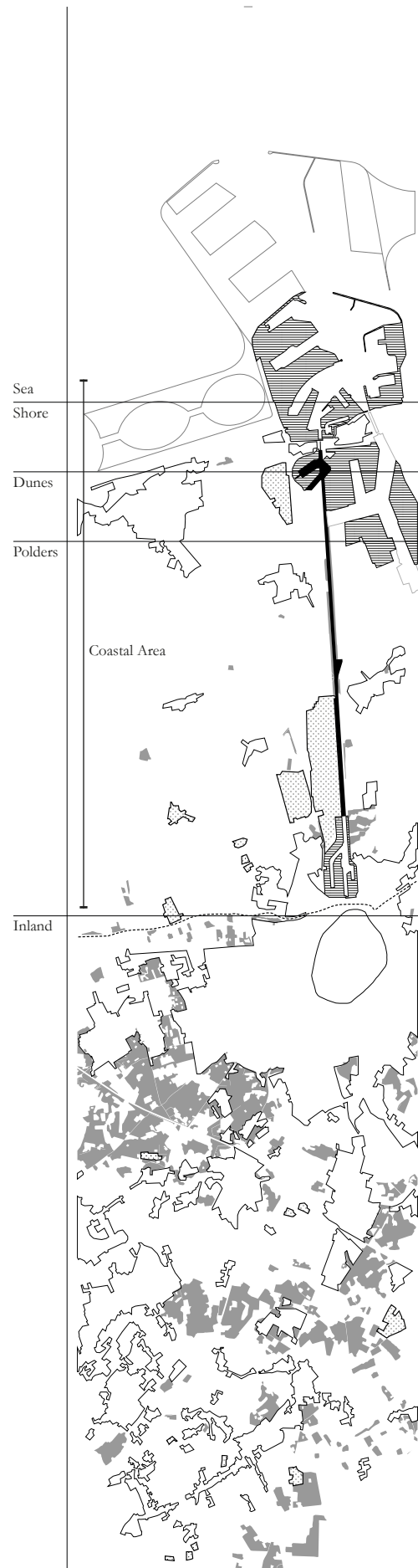


Yearly Average Temperature in Belgium (black: general; dotted: sea-water). A pattern of growth is clear.



Oostende, 2018.
The Flemish Coast is gradually getting closer to look like a continuous “tropical” holiday city: a Miami Beach on the North Sea.

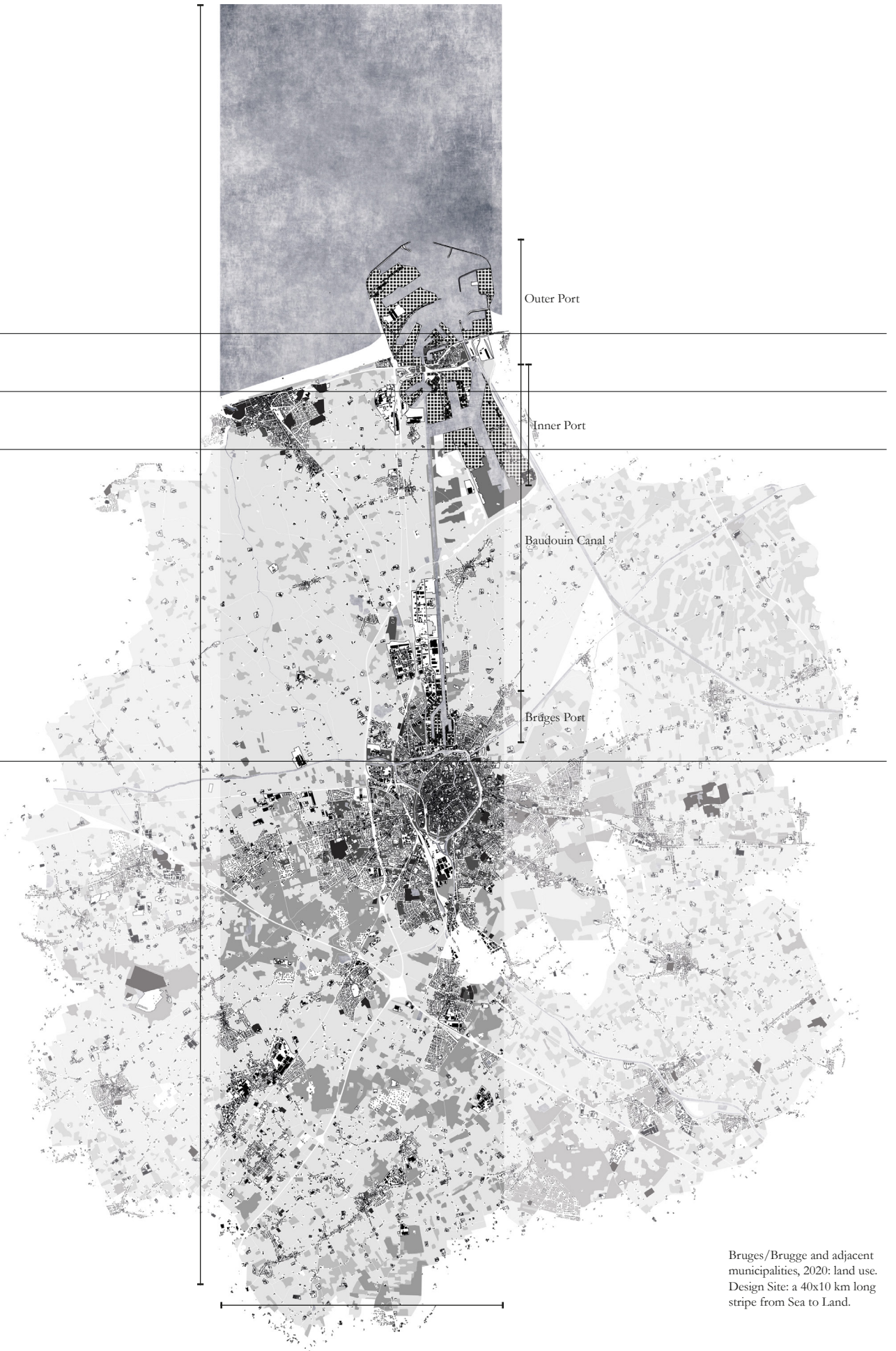
2.1.2. Morphological Edges



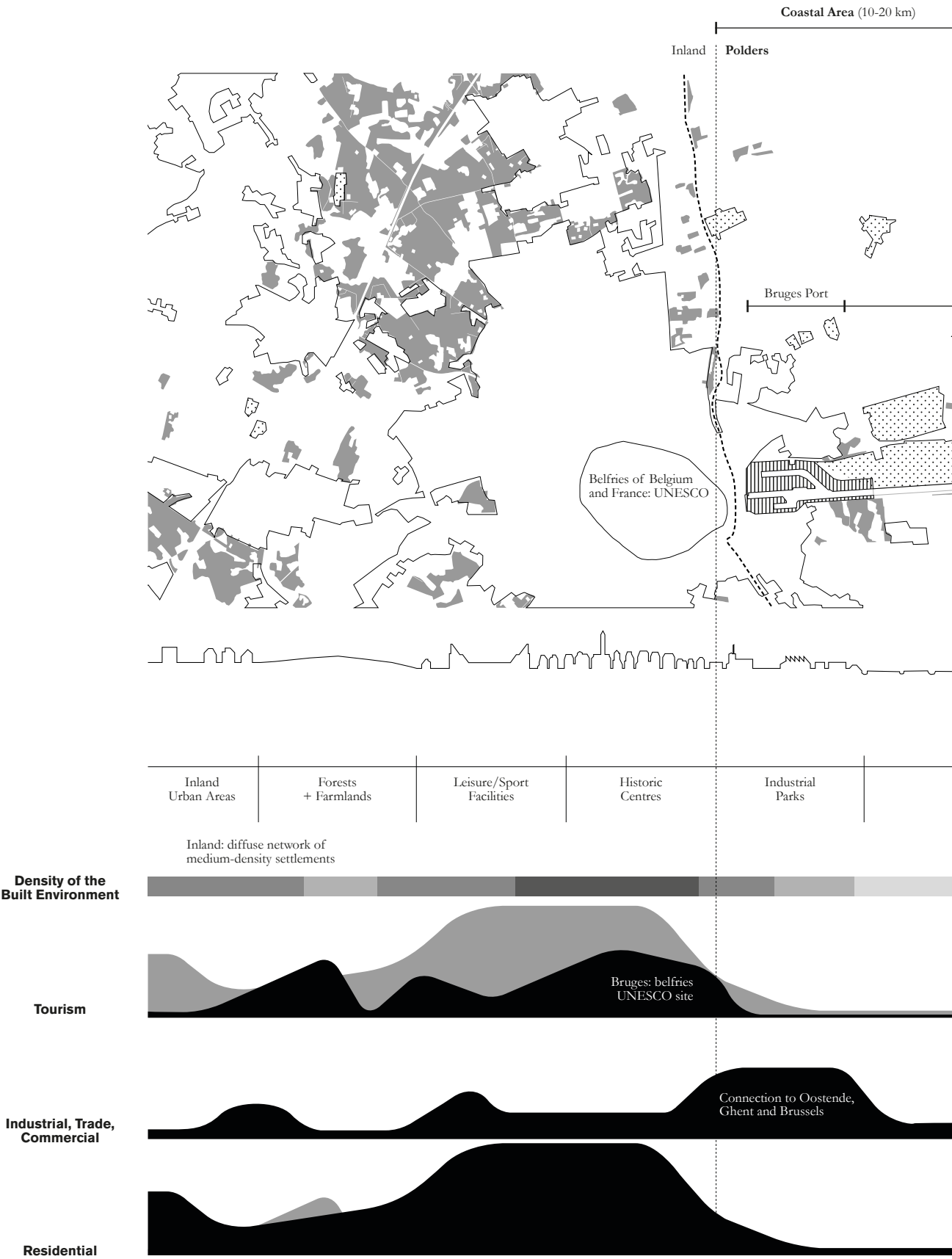
The Pier of Bruges

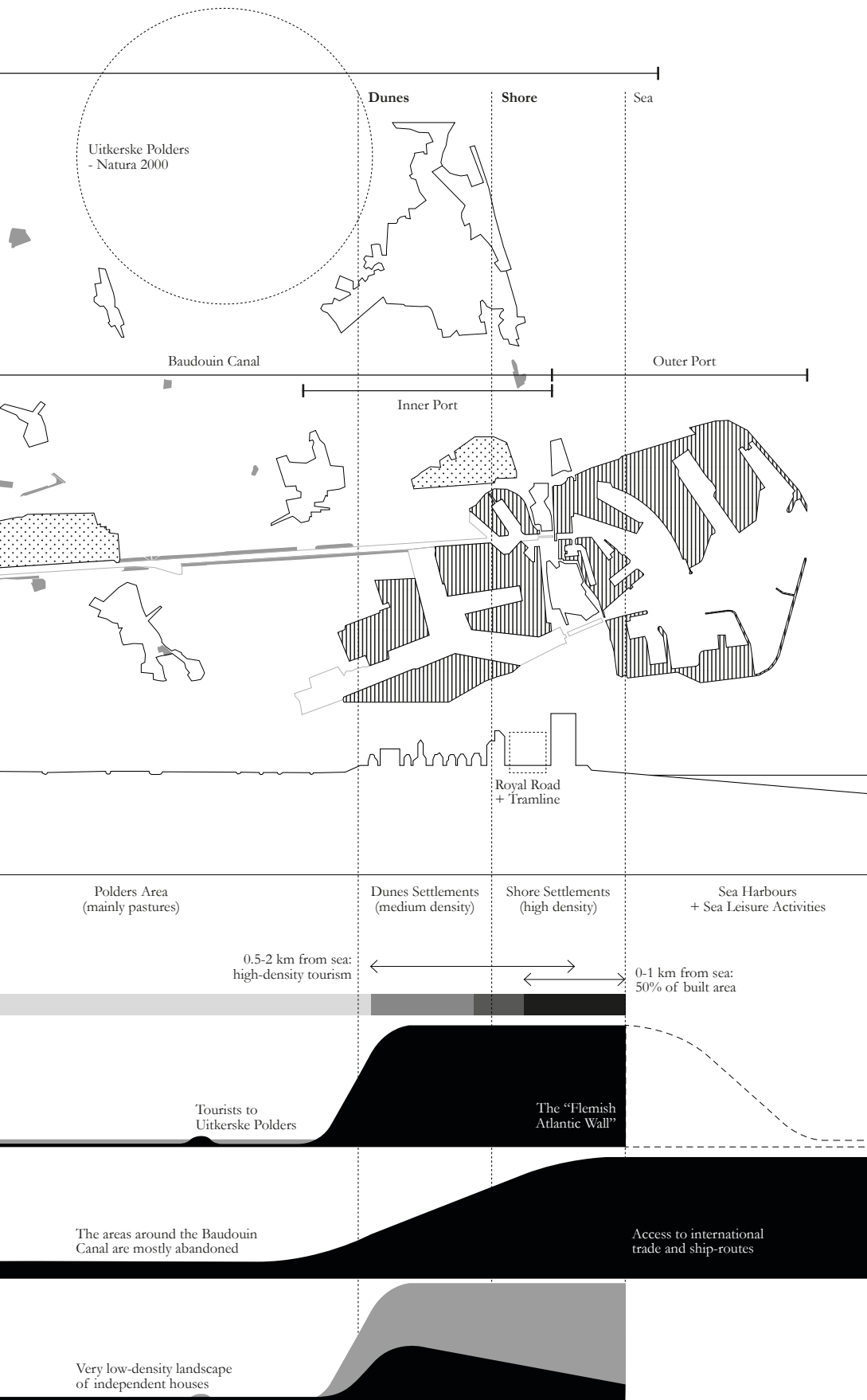
A stripe of 40x10 km can be traced in order to further study the logics of territorialization within the FCR. This includes the very physical representation of the typology of the Pier, as defined previously. Meant as a projection/imposition of the exploitative will of land - Bruges - on sea, the stripe is divided in five parts, the extreme ones being the two opposites of land and sea.

The remaining three, forming the Coastal Area, will be further developed as the local mirror of the linear narrative of territorialization. In the following pages, the relation among these parts will be traced.



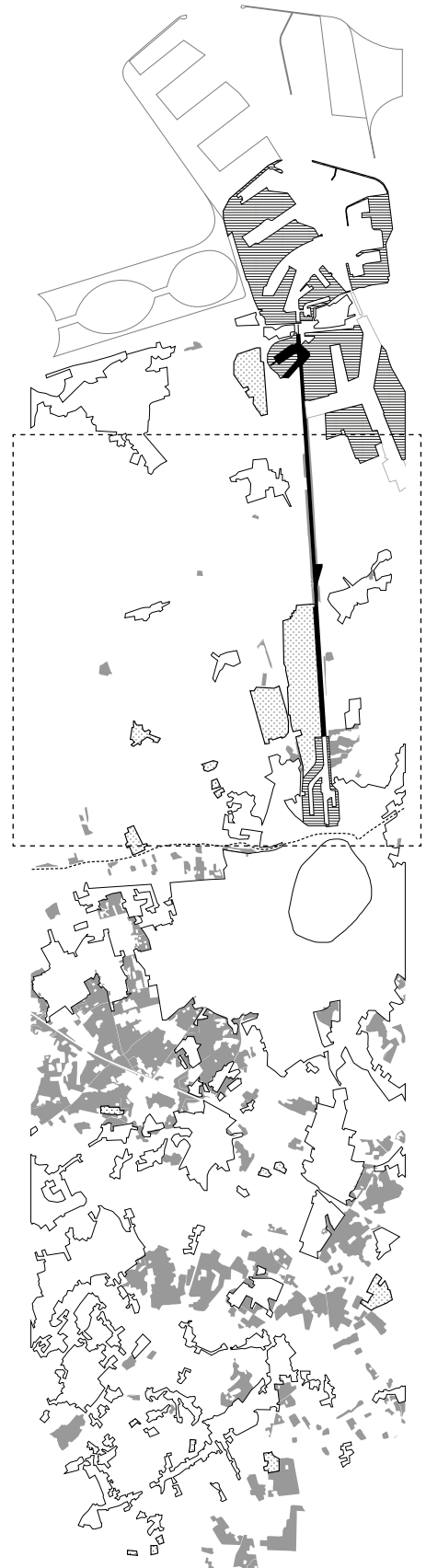
Bruges/Brugge and adjacent municipalities, 2020: land use.
Design Site: a 40x10 km long stripe from Sea to Land.





Revised Geddes Section.
Main functions and densities in
the Coastal Area (10-20 km).

Polders



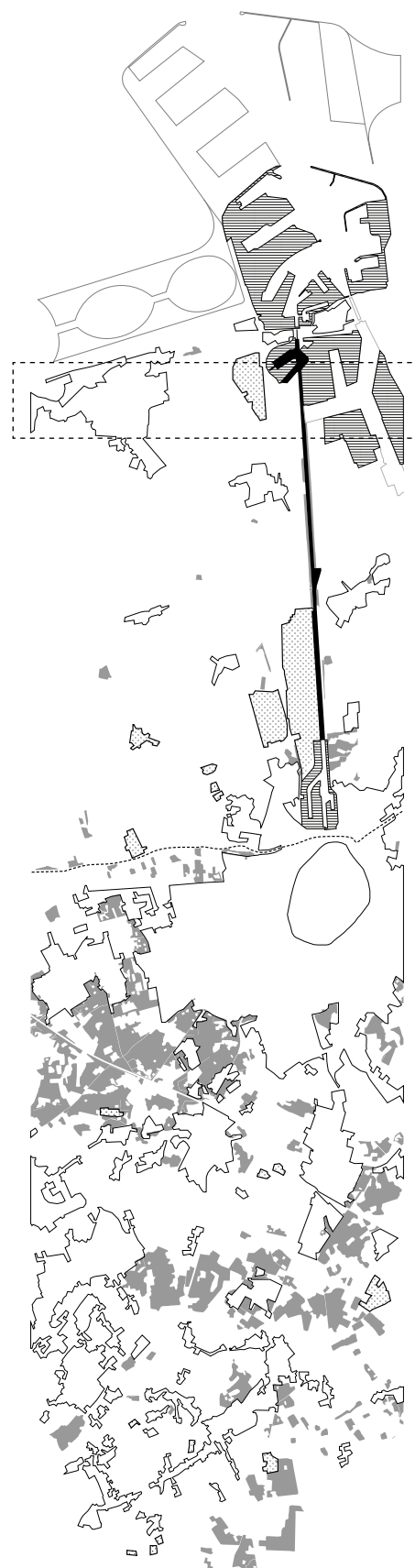


Uitkerske Polders



A random polder

Dunes



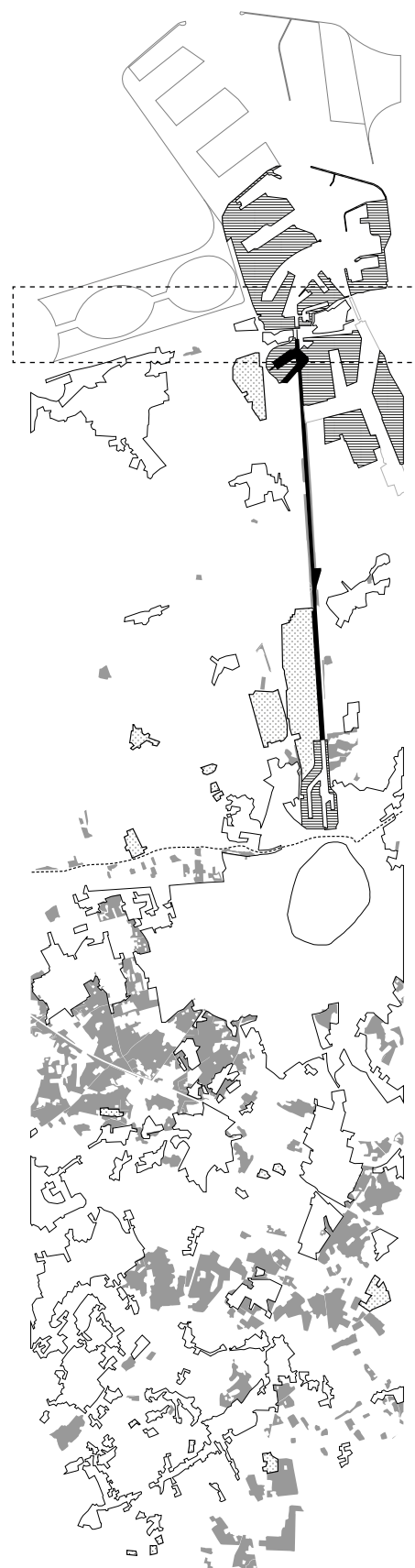


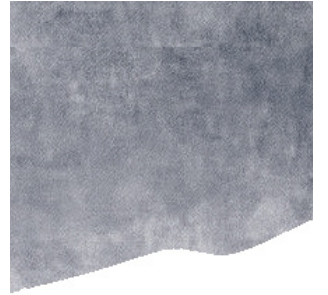
1:2000
De Haan



1:2000
Oostende

Shore



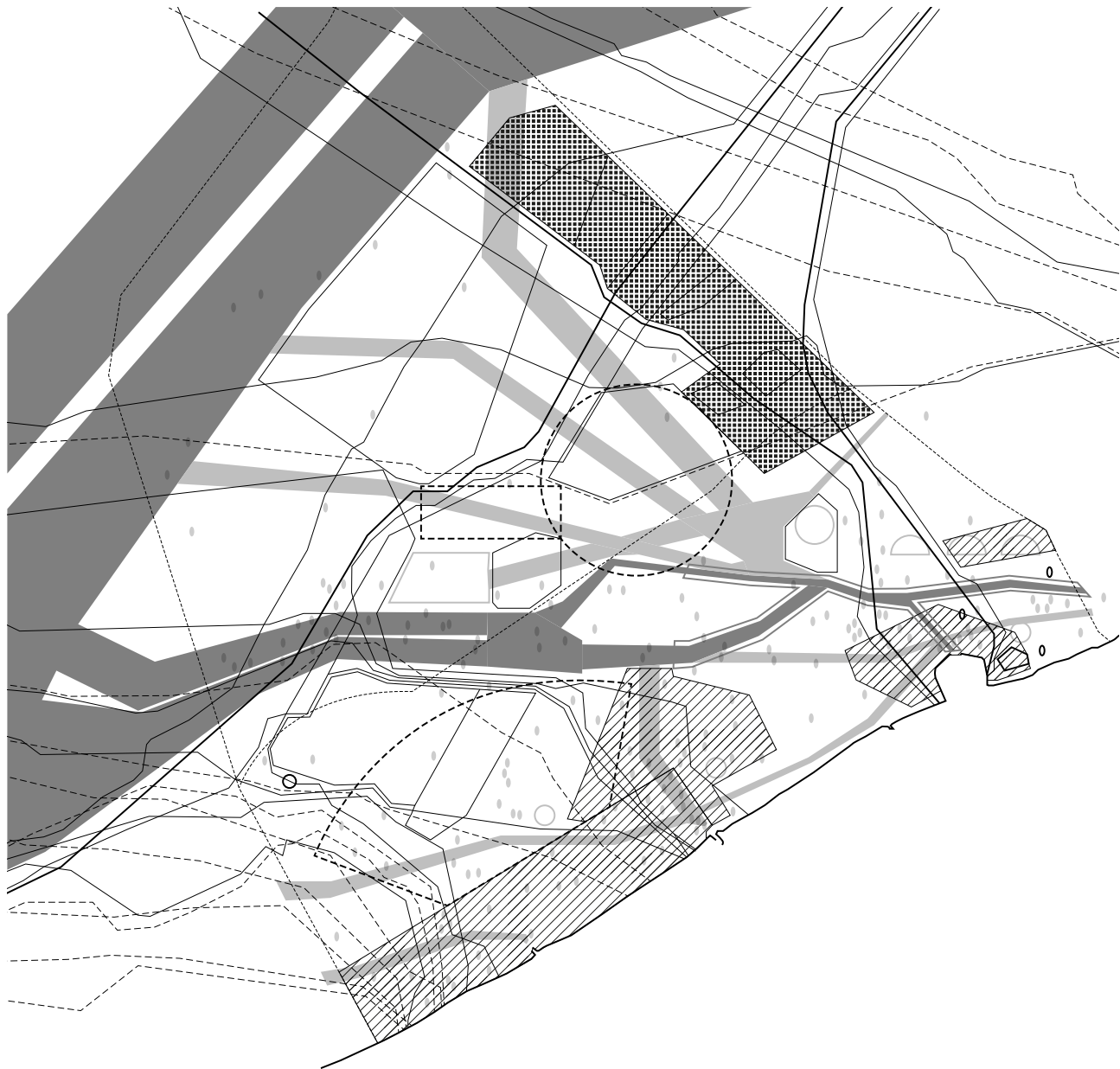


40% of the Flemish Coast:
Natural Landscape



60% of the Flemish Coast:
the Atlantic Wall
(6 floors or higher)

Sea

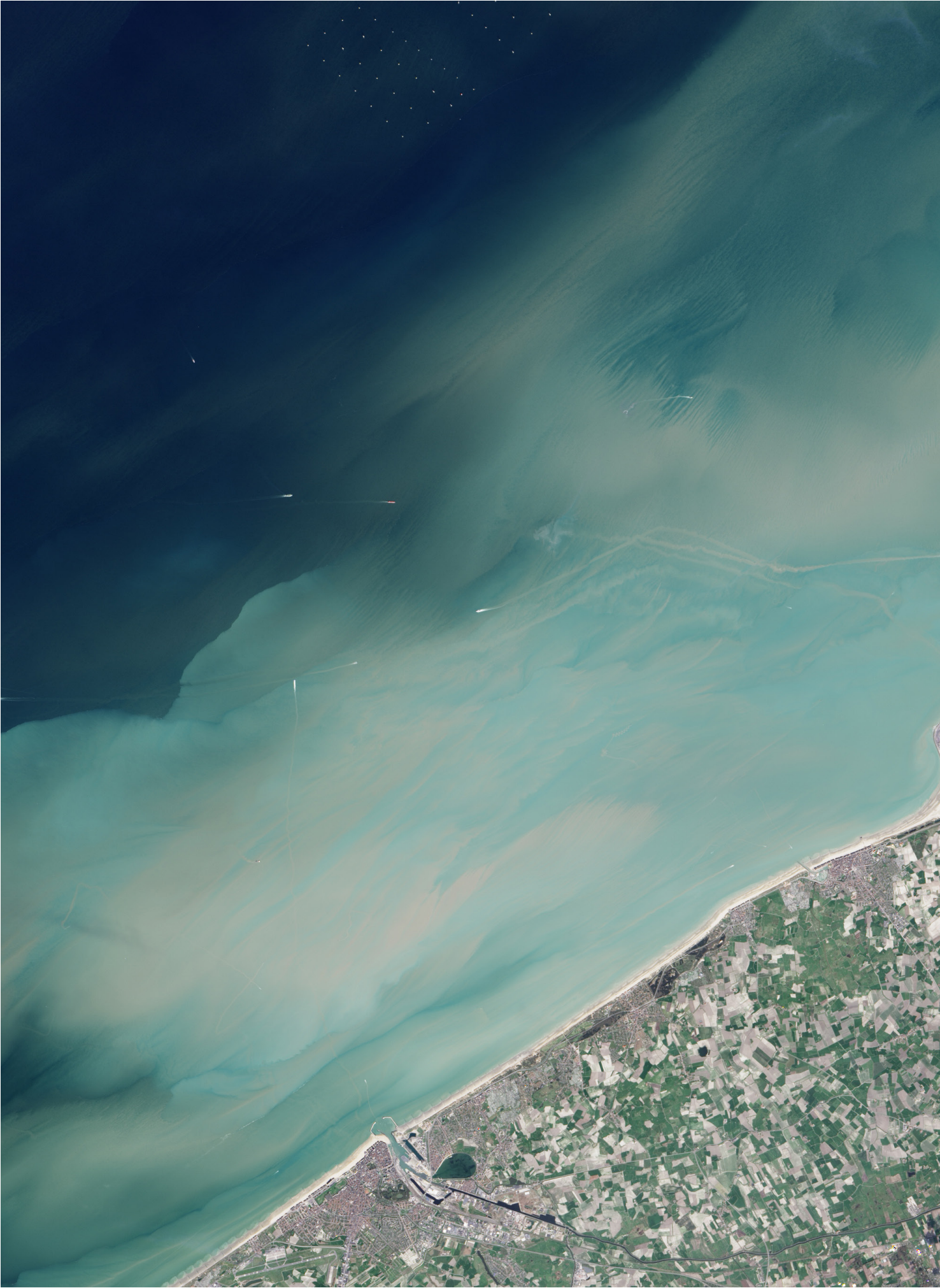


- Primary international trade routes
- Secondary national trade routes
- Vessel "parking" zones
- ▨ Protected or restricted areas (Natura 2000)
- ▩ Offshore wind park concession zone
- ▧ Dredged zone (vessels corridor)
- ▦ Military operations zones
- Pipelines
- Cables in use (electricity, data, etc.)
- Cables not in use - abandoned
- Borders (national, maritime zones)
- Weather stations
- Wrecks
- Radar

Maritime Masterplan,
Belgium, 2019.

*In the next page: the Belgian
offshore wind park at the
horizon from the beach of
Knokke-Heist.*









Futures:
Controlled Retreat
or Bold Advancement?

*Storms can be really strong, and the
externalities can be very impactful
for the touristic sector.*

*In the previous page: NASA Earth
Observatory, Sediments Betray
Hidden Shipwrecks in front of the
Port of Zeebrugge, Easter Flem-
ish Coastal Region (BE), 2014*

2.2. Problem Statement and Research Question

As appears from the historical and morphological analysis of the site, the Flemish Coastal Region is trapped in a path-dependency condition by its own exploitative logics of territorialization. Its existence necessarily depends on the very political act of constant subjugation of the sea - as land reclamation, maritime masterplanning, storm waves control, sea level rise mitigation. However, due to climate change and over-exploitation, the sea itself is now threatening the (un)balance of the whole territory, perhaps finally unveiling the weaknesses of the rationalizing process - or its ephemeral nature.

Only two outcomes are possible, and a radical choice is needed. Either the controversies of this linear narrative of territorialization will prevail, thus stopping or even reversing the process of imposing rationalization, towards a more balanced and less anthropocentric condition; or human ingenuity will propose a technological fix once more, and the existing and coming issues will be solved through *more* territorialization - but more instability as well. Besides the ethics of this dilemma, due to the path-dependency condition described previously, the latter scenario is more likely to happen, and will be here embraced. The will to resist and inhabit the territory - and the pride of our ingenuity - is assumed to always prevail on the de-structuring of the territory itself. However, pride quickly degenerates in *hybris*; if we are not reminded of its ephemeral condition: thus, the possibility of perpetual territorialization must not be pursued at all cost.

The dichotomy - and coexistence - between opposites - rational and irrational, land and sea - has to survive, thus not everything can become a territory, despotically overwhelmed by and subjugated to the collective will of survival. The “sea condition” need to become a central notion again. There is the need to explore new opportunities of confrontation between opposites, in order to preserve the memory of the endangered ones, while reminding the uncertain and instable nature of the others. It is necessary to unveil the possibility of their coexistence.

“An extraordinary techno-managerial apparatus is under way, ranging from new eco-technologies of a variety of kinds to unruly complex managerial and institutional configurations, with a view to producing socio-ecological fix to make sure nothing really changes.” (1)

1. Swyngedouw, Erik.
“Apocalypse Forever?” in
SAGE Journals, vol. 27 n. 2-3,
2010, pp. 212-232.

Where is the edge to be put?

Is it possible to translate the rational-irrational dichotomy in an architectural artefact, in order to create awareness on the ongoing processes while mitigating the coming waves of territorialization?

Sub-questions

1. *How can individual and collective freedom coexist on the Sea?*
2. *How is it possible to exclude an area from becoming a territory without already imposing any law - thus a nomos?*
3. *How can the citizens be made conscious of the threats of sea exploitation - its ephemeral nature?*





3.
PROJECT:
**ISLAND-
-MACHINE**

3. Project: Island-Machine

3.1. Proposition

Seascapes only make sense if there are strong human traces. (1)

3.1.1. The Island Condition

Meant as a metaphorical *mise en scène* of the perpetual tragedy of territorialization (2), a multiscale and multi-temporal project needs to be proposed, in order to properly address the two research questions in all their declinations - spatial and temporal, territorial and architectural.

Is there still space for a Romantic dream of the Sea besides its definition as Productivist Territory? And if so, how is it possible to combine these two opposite visions - the Productivist and the Romantic - in order to create awareness of the dichotomy - and avoid the denial of their necessary coexistence?

Is it possible to translate the rational-irrational dichotomy in an architectural artefact, in order to create awareness on the ongoing processes while mitigating the coming waves of territorialization?

“The choice to directly work *on* the sea – and therefore the theme of the island – comes naturally as an answer to the research premises. An island is by definition isolated – a closed system without any interference; a convenient tool to mirror/project a truly “naked society”, free from the roots and limitations of land. However, an island can also be strongly linked to its surroundings, if it is considered the furthest outpost of the exploitative logics of land towards the sea. As such, it is part of a *pier*, defined as the transitional element between the static rational logics of land and the dynamic romantic essence of the sea” (3).

The *pier* is therefore chosen as the territorial typology to better provide awareness of the land-sea dichotomy, specifically in its radical archetype of the island, meant as a “new world”, a reconstruction, a miniature [of society], a utopia (4). Indeed, despite and besides the traditional connotations of exclusion and segregation, the island becomes “a potential place for autonomy and experimentation within and against both state [political imposition] and market [economic exploitation]” (5). Rational and Irrational - and the Romantic and the Productivist - can exercise here their most extreme confrontation, and the most explicit outcome of their tension.

As the furthest front-line of the last Flemish advancement towards the Sea, the island would be the harshest and most extreme of all the territorial impositions - up to now. However, exactly due to the dull certainties coming from such an univocal and radical condition, the opportunity would arise to seed the germs of uncertainty - to mitigate the very act of anthropic imposition. Within the glorious narrative of sea territorialization, the island-machine would represent the highest peak of human ingenuity, the most sophisticated technological fix, a symbol of anthropic pride and victorious celebration; yet, its very same condition of being an island - relying on the exploitation and control of a very dynamic and fearful surrounding environment - places the seeds to recognize the ephemeral nature of territorialization itself. In the end, an island is also a fortress - and fortresses are always doomed to surrender (6).

1. Servino, Beniamino, *Monumental Need - Necessità Monumentale*, Siracusa: LetteraVentidue, 2012.

2. The tragic event as unveiling of the real being, or as event (according to Nietzsche); tragedy as the representation of the perpetual tension/ conflict/confrontation between Nature and Culture, also meant as Technology. Further on this theme in: Cacciari, Massimo, Donà, Massimo, *Arte, tragedia, tecnica (Arts, tragedy, technology)*, Raffaello Cordina Editore, 2000.

3. An extract from the Reflection Paper.

4. Ghidoni, Matteo (ed.) et. al., *San Rocco: Islands*, n.1, 2011 .

5. Aureli, Pier Vittorio, Sheherazade Giudici, Maria, *Islands: Rethinking the Settlement Form from Property to Care*, Architectural Association School of Architecture, Diploma Unit 14, 2019.

6. Ghidoni, Matteo (ed.) et. al., *San Rocco: Islands*.



3.1.2. Path, Process, Ritual, Cycle

The island as mirror, as outpost, as machine: in any case, the Naked Island. The anthropic island exists only in relation to land, as a projected image of it, therefore as an element which is deeply dependent from people - individuals or the collectivity. The introduction of the “human element” becomes crucial, also due to the stated aim to unveil this linear narrative of territorialization to its “users”, thus to create awareness of it among people. It is therefore a matter of experiences, or the possibility for people to begin a journey (or several journeys) to discover (or explore, in the romantic meaning defined previously) the logics which regulate the survival of the territory itself. The *journey-as-experience* has been used for long as a tool of territorial, architectural or artistic design-research-critique (7). More specifically, the act of “moving through, traversing” can be defined as “an instrument of phenomenological knowledge and symbolic interpretation of the territory” (8).

7. From the banal-visits of
by Dada to the International
Situationist psychogeography.

8. Careri, Francesco,
*Walkscapes: walking as an aesthetic
practice*, Culicidae Architectural
Press, 2017

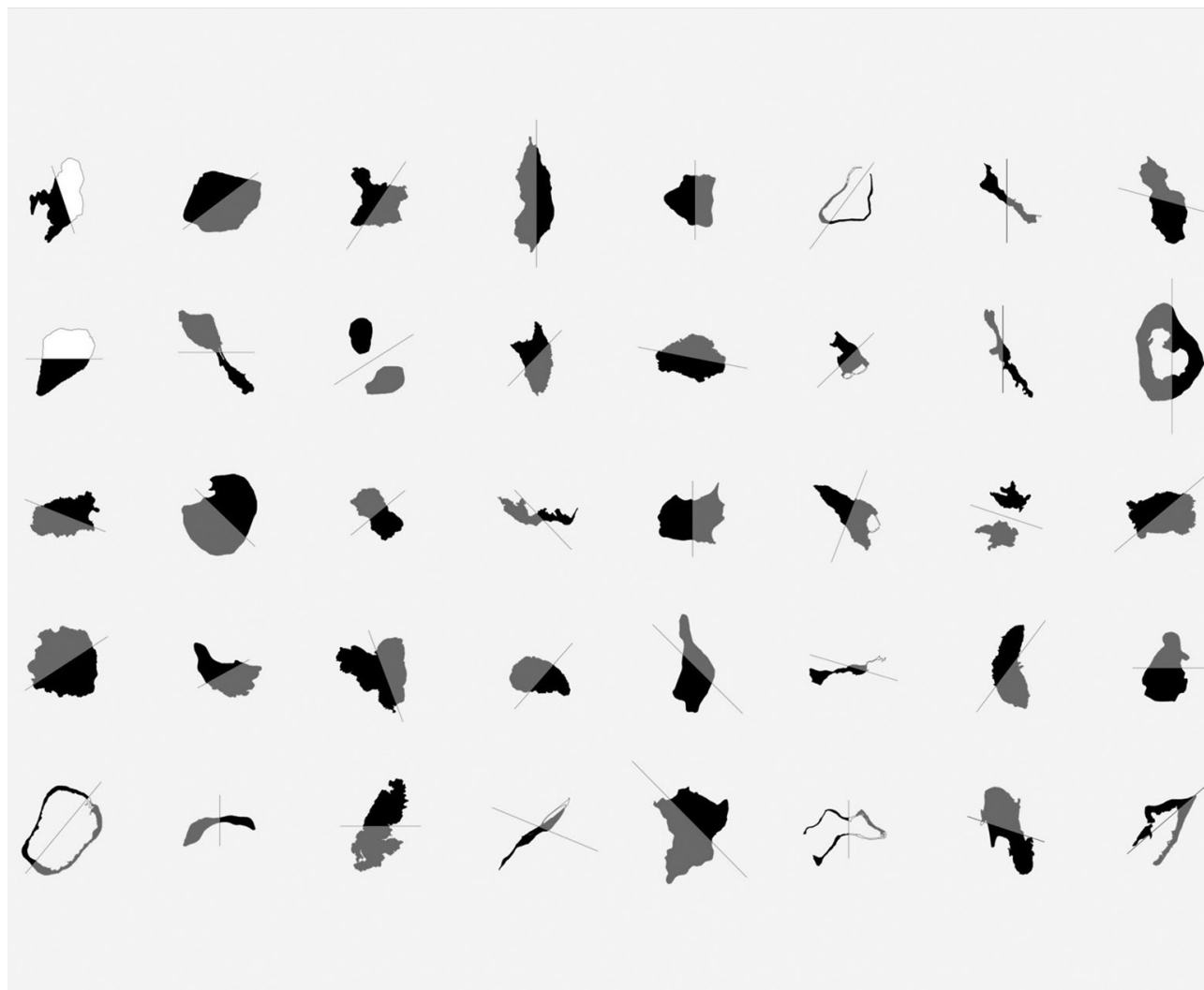
However, the notion of the *journey-as-experience* cannot be confined to the only act of moving towards the island. The island itself, being the extreme symbol of the tension between opposite systems, hosts several journeys, from mechanical non-human processes to anthropic parasite rituals, until passive natural cycles. Some of these will celebrate the territory, some others will act as warnings to its ephemeral conditions, some will prevent the memory of the sea to be lost, other will allow the survival of the region through the harshest exploitative logics. Tracing the edge(s) between all these elements - or unveiling them - becomes the design principle to rule the whole intervention.





*Island of Hashima (JP), 2018.
source: San Rocco 1: Islands*

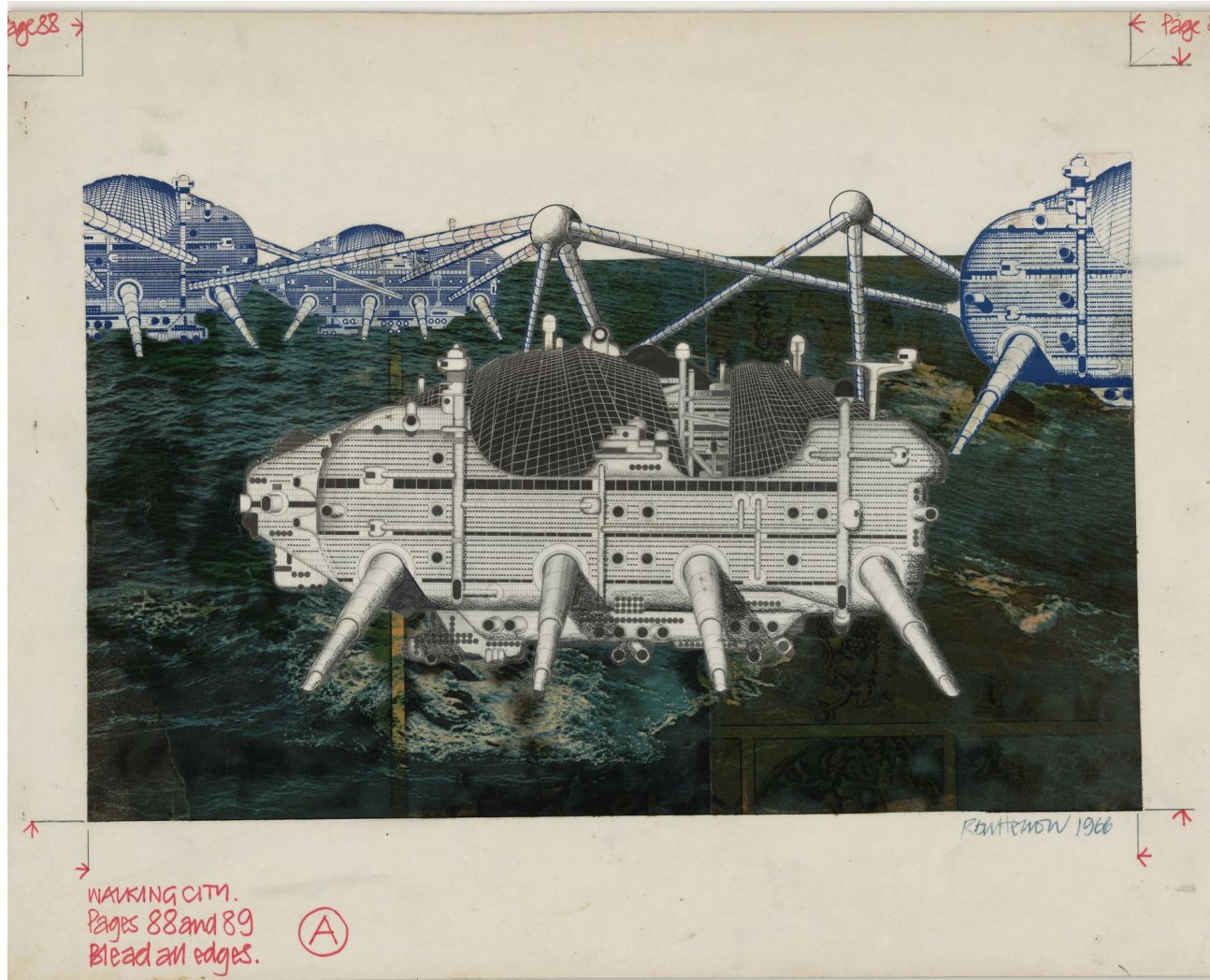
Island as Outpost





Fort Boyard, 61x31x20m, Pertuis d'Antioche Strait (FR), 2015.

Island as Machine





Chloe Dewe, *Boys play in the water in front of offshore oil rigs at Sixov Beach, on the outskirts of the city, Baku (AZ), 2010.*

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