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**The Paradox
of Progress**
How Green Development
in the European Arctic
Exacerbates Human Rights
Violations

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The Paradox of Progress: How Green Development in the European Arctic Exacerbates Human Rights Violations

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Summary

Il concetto di protezione ambientale ha subito diverse trasformazioni sin dalla sua concezione, passando da una semplice e generalistica politica antinquinamento a politiche più complete e approfondite che ricoprono più settori - dai corpi idrici, al suolo, all'aria, fino ad intrecciarsi con la salute umana. Si è giunti a un punto in cui l'ambiente è stato considerato così importante che gli sono stati riconosciuti dei diritti, analogamente ai diritti umani, e si sono sviluppate dottrine più eco-centriche in parallelo. Il fine ultimo dei diritti ambientali è proteggere l'ambiente e tutto ciò che vi vive all'interno, come l'uomo, la flora e fauna, con una forte necessità di tutelarli anche per le generazioni future, poiché il cambiamento climatico e l'inquinamento stanno affliggendo il pianeta come mai prima d'ora. La protezione ambientale è stata, in un certo senso, rivoluzionata dalla Conferenza di Stoccolma: se, prima di allora, i trattati in materia di ambiente erano ratificati principalmente per evitare contaminazioni di inquinamento transfrontaliere tra Stati, divenne evidente come un ambiente malsano avrebbe avuto un impatto su tutti - anche sui *decision maker*. Dopo il 1972, furono firmati sempre più trattati, convenzioni e dichiarazioni congiunte, e divenne diffusa la consapevolezza dell'impatto che avrebbe avuto sull'uomo, cementando la natura intrecciata tra la salute dell'ambiente e la salute umana.

Allo stesso tempo, negli anni '80, lo sviluppo di un altro movimento diede ulteriore impulso alla protezione ambientale: quello dei diritti indigeni. Esiste una profonda correlazione tra i Popoli Indigeni e la terra che abitano. In primo luogo, fin dai tempi antichi, molte religioni, pratiche, e tradizioni indigene sono state legate alla terra da loro abitata. In secondo luogo, gli strascichi del periodo coloniale e la conseguente usurpazione di territori indigeni hanno accentuato la necessità di pratiche volte alla ri-appropriazione da parte delle comunità indigene. I diritti degli indigeni si sono sviluppati ampiamente, ma non sono ancora pienamente rispettati, né talvolta riconosciuti. Due dei documenti più importanti relativi ai diritti degli indigeni sono la Convenzione C169 e la Dichiarazione delle Nazioni Unite sui Diritti dei Popoli Indigeni. Il primo, pur essendo giuridicamente vincolante, è stato ratificato da un numero esiguo di Stati, mentre il secondo è una dichiarazione delle Nazioni Unite e quindi non vincolante. Entrambi i documenti pongono l'accento sulle questioni relative alle terre indigene e su come debbano essere gestite dai popoli indigeni piuttosto che essere soggette a ingerenze da parte degli Stati in cui esse si trovano.

Particolarmente rilevante è la questione dell'estrazione delle risorse, trattata anche in entrambi i documenti. L'estrazione delle risorse è presente in una moltitudine di accordi internazionali, non solo in quelli legati alle questioni ambientali. Ma persino nella Dichiarazione di Stoccolma del 1972 si afferma chiaramente che “[...] gli Stati hanno il diritto sovrano di sfruttare le proprie risorse [...]”. La sovranità è un concetto piuttosto complesso: è uno dei principali motivi per cui gli Stati non riconoscono i diritti indigeni, poiché significherebbe rinunciare a una parte di essa, ed è risaputo che gli Stati sono disposti a fare grandi sforzi per affermare la sovranità sui propri territori, arrivando persino a scatenare guerre.

Le risorse, soprattutto quelle di tipo minerario, si trovano in tutto il mondo, ed alcuni Stati - soprattutto quelli più grandi - ne hanno in gran abbondanza, mentre quelli più piccoli potrebbero avere meno risorse o una sola risorsa significativa. Le risorse hanno una forte rilevanza geopolitica. Coloro che ne hanno in abbondanza possono estrarle e scambiarle con Stati che non le hanno ma ne hanno bisogno - o usarle come strumenti di negoziazione. Poi ci sono Stati, come la Repubblica Democratica del Congo, che si specializzano nell'estrazione di una sola risorsa, il cobalto, e vengono sfruttati come mai prima d'ora dai propri governi, o da compagnie estere. Minerali e metalli hanno sempre avuto una certa importanza, ma ancora di più con l'ascesa dell'industrializzazione: gli Stati che potevano produrre di più erano considerati più ricchi e luoghi ideali per investire, mentre quelli che non potevano offrire risorse rilevanti dovevano cercare altri modi per sopravvivere nel mercato internazionale. Nel secolo scorso, le risorse erano essenziali per lo sviluppo delle armi, e non sorprende che nei periodi bellici, gli Stati occupassero fisicamente zone produttive o zone con un'alta presenza di risorse minerarie. I progressi tecnologici non si fermarono dopo il periodo interbellico, e sempre più Stati necessitavano di maggiori risorse da poter estrarre dai propri territori. È in questo momento che gli Stati spostarono la loro attenzione sulle terre indigene, sfruttandole senza riguardo né per le popolazioni locali né per l'ambiente e gli ecosistemi circostanti. Iniziò una corsa alle risorse, che si intensificò durante la Guerra Fredda: la minaccia di annientamento rendeva i paesi frenetici nella ricerca delle risorse necessarie per costruire armamenti bellici, e l'estrazione delle risorse divenne una priorità nazionale per molti Stati, indipendentemente dalle esternalità prodotte.

Di per sé, l'Artico non è diventato veramente predominante sulla scena internazionale fino alla Guerra Fredda. Da un punto di vista storico, l'Artico è stato considerato una *terra nullius* fino all'inizio del 1900, e anche prima di allora non fu molto esplorato né sfruttato, nemmeno dagli

Stati artici. Per secoli l'Artico è rimasto incontaminato nella sua glaciale impenetrabilità, con gli Stati che non vi investirono risorse proprio a causa delle difficili condizioni ambientali e delle scarse prospettive di sopravvivenza. Ma questo non significa che fosse effettivamente una *terra nullius*: era, e lo è ancora oggi, abitato da comunità che hanno fatto dell'Artico la loro casa per migliaia di anni. Tuttavia, come accennato in precedenza, gli Stati attribuiscono grande importanza alla sovranità, e quando la formazione di una coscienza nazionale durante il Romanticismo fece breccia in Europa e Nord America, gli Stati più settentrionali si affrettarono a tracciare i confini delle loro Nazioni su mappe - e questo significava entrare in pieno contatto con le popolazioni artiche. Colonizzazione, assimilazione, schiavitù e stermini divennero la norma per gli Stati nordici per affermare il loro dominio sui territori più settentrionali.

Nei primi anni della colonizzazione artica, la maggior parte dei paesi si concentrava principalmente sulla pesca, la caccia alle balene e la cattura di animali da pelliccia - al punto che alcune specie animali furono spinte sull'orlo dell'estinzione. L'occupazione territoriale rese la vita difficile per le popolazioni artiche, ma quando i loro mezzi di sussistenza gli furono sottratti dai coloni, la loro vita divenne quasi impossibile. Ancora di più quando i governi centrali iniziarono a promuovere politiche di assimilazione, sopprimendo 'l'alterità' e costringendo queste popolazioni ad assimilarsi con la 'vera' popolazione. L'estrazione delle risorse nel senso più moderno del termine arrivò molto più tardi, tra la metà del XIX e l'inizio del XX secolo. Essendo l'Artico quasi incontaminato dalla presenza umana, rispetto alle altre regioni, era ricco di risorse pronte per essere sfruttate: è il caso dei minerali, dei fiumi, e più tardi del petrolio e del gas. Gli Stati iniziarono a perforare i terreni per estrarre minerali e metalli per sostenere la loro industrializzazione, e cominciarono a costruire dighe per soddisfare i bisogni energetici con le centrali idroelettriche. Quando furono realizzati i primi progetti, non si fecero molti scrupoli verso il deterioramento della terra e al conseguente peggioramento della salute delle popolazioni locali. È, infatti, il loro "diritto sovrano di sfruttare le proprie risorse" (UN, 1972).

Lo sfruttamento dell'Artico non si è mai davvero arrestato: raggiunse nuovi picchi durante il periodo interbellico e continuò costantemente durante la Guerra Fredda fino ai giorni nostri. Con l'avanzamento tecnologico arrivò anche il progresso scientifico, e gli effetti negativi dell'estrazione delle risorse divennero ben noti ai *decision makers* - ma ciò non sembrava importare, poiché l'Artico veniva ancora concepito come *terra nullius*, e la sua lontananza dal cuore dello Stato fece adottare un atteggiamento di *'out of sight, out of mind'*. Gli accordi

ambientali sviluppatasi dopo gli anni '70 erano, purtroppo, per lo più strumenti non vincolanti, rendendoli largamente inefficaci. Si giunse ad un punto di non ritorno per il degrado ambientale, con il cambiamento climatico che imperversava in tutto il mondo – ma soprattutto nel *Global South* e all'interno delle comunità indigene.

La scienza afferma chiaramente che l'Artico deve essere protetto per frenare il cambiamento climatico (Hancock, n.d.; Greenpeace, 2017), ma è difficile riuscire a proteggerlo nella sua interezza. L'inquinamento globale incide direttamente sull'Artico, il quale porta allo scioglimento dei ghiacci e della neve, entrambi essenziali per il raffreddamento del pianeta e quindi per mitigare gli effetti del cambiamento climatico. Quindi l'unica soluzione era contenere l'inquinamento, e gli Stati, come nella Conferenza di Stoccolma, decisero di incontrarsi nuovamente per risolvere il problema. Tuttavia, ciò non significò nel rallentamento dello sfruttamento delle risorse nell'Artico o altrove – in realtà, esso aumentò ed è destinato ad aumentare ancora di più nei decenni ad avvenire. Emblematica di questa nuova ondata di protezione ambientale è la diffusione dei cosiddetti *Green New Deals* (GND): ispirati al *New Deal* del presidente statunitense Franklin D. Roosevelt, gli Stati iniziarono a creare piani di politica economica e di sviluppo per passare dai combustibili fossili alle energie rinnovabili. Questi piani comportano la protezione e la rigenerazione ambientale, accompagnate da una transizione a livello nazionale dai combustibili fossili alle energie rinnovabili e verdi, mantenendo o addirittura aumentando la crescita nazionale. L'Unione Europea ha sviluppato il *Green Deal* europeo, uno dei piani di GND più articolati e completi. Il suo motto è quello della crescita economica rinunciando ai combustibili fossili e “senza lasciare nessuno indietro” (European Commission, n.d.), dando il via a tre transizioni: una transizione verde, una energetica e una giusta. Non è facile da attuare, poiché richiede un enorme capitale, sia in termini di denaro che di risorse materiali. L'estrazione di energia rinnovabile è infatti estremamente intensiva in termini di risorse materiali. Per produrre anche i componenti più piccoli, come i chip o le batterie, sono necessari materiali rari, e la loro estrazione proviene da Stati i cui governi sono o corrotti o riluttanti a cedere i propri materiali senza accordi favorevoli. Questa è la ragione del *Critical Raw Minerals Act* (Regolamento 2024/1252) dell'Unione Europea. L'obiettivo è creare liste di materiali essenziali necessari per sostenere la transizione energetica e produrli all'interno dell'Unione o garantire una fornitura sicura e continua da paesi terzi.

L'Artico torna così a essere protagonista. Miniere, centrali idroelettriche e impianti eolici sono strutture la cui presenza è pervadente nell'Artico, compreso quello europeo. Le regioni più settentrionali degli Stati artici europei sono scarsamente popolate, con la maggior parte della popolazione che vive in città portuali o in città minerarie – c'è, secondo gli Stati, abbondanza di territori disabitati da sfruttare. Ma la realtà è diversa. Nell'Artico europeo vive l'unico gruppo indigeno d'Europa, i Sámi. Essi hanno vissuto tutto ciò che è stato sopracitato, e soffrono ancora ad oggi della mentalità coloniale degli Stati scandinavi, mai completamente abbandonata. La maggior parte di loro vive in quella che viene chiamata Sápmi, una terra che comprende i territori più a nord di Norvegia, Svezia, Finlandia e della penisola di Kola nella Federazione Russa. Sápmi è la loro terra ancestrale, e i loro mezzi di sussistenza dipendono da essa sin da quando si stabilirono nella regione migliaia di anni fa. Emblematica dei Sámi è la pratica dell'allevamento delle renne, anche se meno del 15% di loro la pratica attivamente. Tale attività è stata resa impossibile dal nazionalismo, dall'assimilazione e ora anche dall'estrazione mineraria e dalle infrastrutture elettriche, che rendono tutto ancora più difficile.

Come detto, la transizione verde è intensiva in termini di risorse, e le infrastrutture costruite per sostenerla sono non solo di grandi dimensioni, ma creano una lunga serie di esternalità negative che spesso non vengono considerate nei dibattiti sulle politiche verdi o sulla mitigazione del cambiamento climatico. Nel caso della Scandinavia (così come altrove nell'Artico), la transizione verde è sostenuta a scapito della terra Sápmi. L'estrazione mineraria iniziò pochi secoli addietro per alimentare il processo di industrializzazione dei nuovi Stati-nazione, e non si è mai fermata. Una delle miniere più famose della Svezia, nonché la più grande miniera sotterranea di ferro del mondo, è Kiruna: fu costruita all'inizio del 1900 su terra indigena e da allora è sempre stata attiva. Nel corso degli anni è aumentata di dimensioni, e come la bocca divorante di un leviatano, sta lentamente ma inesorabilmente inghiottendo la città di Kiruna stessa – che sarà completamente trasferita qualche chilometro più a sud, nuovamente su terra Sámi. La miniera ha trasformato il paesaggio in una terra desolata e arida, e l'inquinamento atmosferico causato dalle trivellazioni non può essere ignorato. Le infrastrutture idroelettriche si svilupparono parallelamente all'estrazione mineraria, divenendo uno dei primi mezzi di sostentamento per gli Stati scandinavi. Comportano un cambiamento nel paesaggio che non va ignorato: i fiumi vengono prosciugati o deviati verso le dighe – ma l'effetto è lo stesso in entrambi i casi. Gli ecosistemi vengono permanentemente alterati, forzando le specie autoctone o migratorie a spostarsi altrove, e così anche il paesaggio. Anche le infrastrutture eoliche non sono così dissimili: con la loro imponente altezza, deturpano il

paesaggio e causano una serie di esternalità che influenzano la fauna locale. Tutte e tre le tipologie di infrastrutture, come detto, lasciano profonde cicatrici sulla terra. Tutte e tre devono ritagliarsi uno spazio molto ampio, il che significa un'intensa deforestazione, cementificazione con la creazione di strade, ferrovie e centri abitativi per i lavoratori, ma soprattutto perpetuano una mentalità coloniale. Tutte e tre rendono quasi impossibile per i Sámi praticare i loro mezzi di sussistenza tradizionali e vivere nelle loro terre senza essere espropriati. Tutte e tre sono essenziali per lo sviluppo della cosiddetta *green agenda*, e non è raro che gli Stati vengano criticati per il loro comportamento, solo per rispondere che tutte e tre rappresentano priorità nazionali e che non si fermeranno nel raggiungimento dei loro obiettivi.

List of Abbreviations

AC: Arctic Council
ANWR: Arctic National Wildlife Refuge
AS: Arctic States
BEAC: Barents Euro-Arctic Council
COM: Communication of the EU
CREEs: Community Renewable Energy Ecologies
C169: Indigenous and Tribal Peoples Convention No. 169
DRC: Democratic Republic of Congo
EGD: European Green Deal
ETS: Emission Trading System
EU: European Union
FPIC: Free, Prior, and Informed Consent
GHG: Greenhouse gas emissions
GND: Green New Deal
HVPL: High-voltage power line
ICCPR: International Covenant on Civil and Political Rights
ICESCR: International Covenant on Economic, Social and Cultural Rights
ILO: International Labour Organisation
IMO: International Maritime Organisation
MARPOL: International Convention for the Prevention of Pollution from Ships
MEA: Multilateral Environmental Agreement
MS: Member State
NC: Nordic Council
NCM: Nordic Council of Ministers
NECP: National Energy and Climate Plans
NGD: New Green Deal
PM: Particle matters
PP: Precautionary Principle
PPP: Polluter Pays Principle
R&D: Research and development
REG: Regional Environmental Governance
SC: Saami Council
TEU: Treaty of the European Union
TFEU: Treaty on the Functioning of the European Union
UN: United Nations
UNCLOS: United Nations Convention on the Law of the Sea

UNDRIP: United Nations Declaration on the Rights of Indigenous Peoples

UNESCO: United Nations Educational, Scientific and Cultural Organisation

UNEP: United Nations Environmental Programme

UNFCCC: United Nations Framework Convention on Climate Change

UNGA: United Nations General Assembly

Introduction

The concept of environmental protection has evolved dramatically since its inception, transitioning from simple policies and agreements to intricate, multi-layered policies.

Since the advent of the 1972 United Nations Conference on the Human Environment, also called the Stockholm Conference, it seems like every corner of society became aware that the environment was something that should be protected from degradation, originating from either human activity or from natural occurring disasters. A shift in mentality also accompanied the development of environmental protection: it is not anymore a human environment, but rather everyone's, including the flora and fauna that thrives within it.

After the 70's, the era of technological advancement certainly brought economic growth and prosperity to new heights, but it also presents itself with a drawback that is difficult to ignore - that of pollution. Technological advancements are instrumental for new means of production in all sectors, making it easier, faster, and cheaper to produce, but production needs fuels and energy to do so, therefore increasing the pollution output. With globalisation and the enticement that prosperity brought, more and more countries all over the world began implementing these technologies, making pollution even more widespread. The duality of technological advancement is exactly this: it brings growth and prosperity, but it has severe drawbacks that are difficult to ignore.

The Green New Deals aim at curbing this. With climate change more evident than ever, policymakers have tried drawing up a plan to switch from the ever-polluting fossil fuels to cleaner energy sources - while attempting not to forego economic growth. If anything, Green New Deals promise an even more prosperous future than fossil fuels could ever provide (H.R. 319, 202; COM/2019/640). It is not easily done: many countries are largely dependent on fossil fuels, and switching to clean energy means that a quite significant amount of capital has to be used - money-wise and materially wise, both very important for the success of the green agenda.

The European Green Deal is the most thorough Green New Deal policy-package that has been implemented. It touches many topics, from transports, to agriculture, to bureaucracy, fishing, logging - even education. Not only that, but it also aims at making the transition from fossil fuels to clean energy a just one: as mentioned, it is a capital-intensive transition and the fossil

fuel sector is well grounded and deeply rooted in certain parts of Europe and by switching to clean energy, many might lose their jobs. The European Union has also thought about the socio-economic implications that the green transition could bring, setting up funds as no one “should be left behind” (COM/2019/640). It is akin to a revolution, a green one, one that the European Union wants to be the leader of.

Once all factors are considered, it brings a positive outlook in the matters of mitigating climate change. But something that is certainly missing from the current green debates is that of resource extraction. As mentioned, to implement clean energy there needs to be infrastructures that provide energy, but ultimately the result is rather similar to that of fossil-fuels extraction. While it does not have the same disruptive effect, energy still has to be produced, and the frankly huge amount of resources needed to fuel clean technologies have to be extracted.

The European Union has drawn up a Regulation called *European Critical Raw Materials Act* which states that to make the green transition happen, there needs to be a safe and steady supply of specific minerals and ores. It also states that at least 10% of the European Union’s annual consumption (Regulation 2024/1252) should be extracted within European borders, and at least 40% of it should be processed inside the European Union. This is to avoid a total dependency on foreign markets that are sometimes unstable or might use their resources as a bargaining chip for more profitable trade agreements.

Some European countries are better prepared for the transition, as either their territories are rife with the needed resources, or have already started using clean energy sources rather than fossil fuel-based ones. That is the case of the European Arctic, the main focus of this thesis. The countries that were taken into consideration are Norway, Sweden, and Finland, with the first having signed the European Economic Agreement which also entails matters of the environment. All three countries have advanced and functioning clean energy infrastructures working within their respective borders, and have declared that with the advent of the green transition, more development should happen to make them fully reliant on clean energy sources.

The three major infrastructures needed to fund the development of the green energy sector that were analysed in the thesis are hydroelectric infrastructures, wind power infrastructures and mining - which is essential to build the first two. But, as mentioned before, the green and energy

transition needs a lot of capital to be built. Resource extraction is a key component of the two transitions, and it has several negative impacts on the environment and on human health. It irreparably damages the landscape, making it brittle, infertile and polluted; it pollutes water sources as well, making it even harder for the neighbouring flora and fauna to survive and thrive in what was their ecosystem first; it pollutes the air with particulate matter, causing grievances to humans and animals alike. All this to fund the creation of clean energy infrastructures. Hydroelectric infrastructures also have a negative impact on the landscape, bleeding dry rivers or redirecting them towards dams. Either way, the landscape is irreparably changed, and biodiversity is lost. Wind power infrastructures are not too dissimilar: with their imponent heights, they deface the landscape and cause a series of negative externalities that affect the local fauna. All three kinds of infrastructure, as mentioned above, leave deep scarring on the land. All three need to carve themselves out a space, and that means intensive logging and deforestation, cementification with the creation of roads, railways and towns to host the workers, but most of all it entails a perpetuation of the settler colonialism mentality.

The Arctic, as a whole, has been subjected to colonialism for several centuries. The Arctic is not an empty land, despite its harsh temperatures, and it has been inhabited for thousands of years by what are today defined as Indigenous Populations. The Arctic is also a land rife with resources, and it has been exploited since southern populations set their eyes on it centuries ago. Resources are essential to the life and development of a State, and the switch to clean energy underlines the necessity to acquire as many resources as possible to implement it. Something that will be discussed in the thesis is the lack of another issue in the current green debates: capital accumulation. The green transition is inevitable, and the prospect of investments and revenue makes it even more appealing in the eyes of capitalists and corporations. Resource extraction is seen as a national priority for States, and they will ignore externalities to deepen their pockets. This will be exemplified in the description of the *Prophet River First Nation v. British Columbia* case, where the local government has planned a mega hydroelectric project while ignoring the fact that the land it was built on is insatiable, effectively making it an impending disaster. The project is nearing completion and will not be dismantled, despite the risks it brings not only to the environment, but also to the local indigenous people - whose land was encroached to build the project on.

The European Arctic is facing a similar issue. It is the home of the Sámi, the only Indigenous group of Europe, and they are still victims of the centuries old settler colonialism mentality of

the Scandinavian States. Their ancestral land is called Sápmi, and it encompasses an area between Norway, Sweden, Finland and the Kola Peninsula of the Russian Federation. It is an area rife with resources that have been exploited for centuries, and with the spreading of green development, it will continue to be exploited. Hydroelectric infrastructures, wind turbines, mines: all the clean energy infrastructures that are needed to fuel the green transition, which bring negative impacts on the environment, are built on Sápmi. The rights of Sámi are not fully respected as indigenous populations, mainly for two reasons: indigenous rights enshrined in conventions are oftentimes ignored or even rejected by States, as they can mine their territorial sovereignty; and the economic growth that the green development brings is seen as a national priority - it brings prosperity to the entire society, therefore the prosperity of the whole is more important than the interests of a few.

Chapter 1. The Development of International and Regional Environmental Protection

1. Introduction

The care for the environment has been at the forefront of international cooperation since the second half of the 1900s — although there have been previous attempts, these were not intended as a way to overcome or prevent environmental degradation, but rather to draw the lines on national properties such as resources and their exploitation (Tignino & Bréthaut, 2020). After World War II, States recognised the transboundary distinctiveness of the environment, and everything that its damaging might entail (Stephens, 2009). A first timid effort to a more cooperative and comprehensive movement to care for the environment in an international setting was done by the United Nations (UN) with the conception of a gathering of States to discuss the environment. It was the so-called Stockholm Conference of 1972, formally known as the United Nations Conference on the Human Environment, that kickstarted a worldwide awareness on the importance of the environment as an international concern (UNEMG, 2022). It was not easily done. One could argue that it was a hazardous attempt to do so, given that the late 1960s and early 70s were rather tumultuous regarding national and international politics — many States probably had other priorities, or simply did not care. The outcome of the Stockholm Conference was a non-binding Declaration of Principles and a Programme for Action, followed by the institutionalisation of a specialised programme: the United Nations Environmental Programme (UNGA, 1972). As mentioned, this conference set off a chain reaction where the environment became more and more relevant in the international field — be it from a political, economic, or a scientific point of view. Another relevant milestone in the evolution of the importance of the environment on an international level was the Rio Declaration on Environment and Development of 1992, that will be thoroughly analysed in the next section.

The UN and its various bodies were not the only actors at this stage of the evolution: States were also protagonists, in a more regional field. It is crucial to recall two key concepts of customary international law: positive and negative obligations of States. Very briefly, the first obligation means that a State has the duty to act to protect and actively encourage the full enjoyment of fundamental rights. On the other hand, the latter obligation means that a State has the duty to not act – in the sense that a State must refrain from acting in a way that might interfere with the full enjoyment of fundamental rights. How does all this relate to the

development of the importance of the environment on a regional level? A crucial negative obligation of States related to the environment is the so-called ‘no-harm principle’. It means that States cannot behave in a certain way within their borders that might have repercussions on bordering or nearby States. This principle is enshrined in the Rio Declaration of 1992, a binding document, but the groundwork was already laid by the Stockholm Conference Declaration, which clearly affirms that “States have the sovereign right to exploit their own resources pursuant to their own environmental policies, and the responsibility to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or of areas beyond the limits of national jurisdiction” (UN, 1972, Principle 21). It is not farfetched to think that the Stockholm Conference, while not binding, would inspire the development of domestic environmental regulations (Chasek, 2022). And, thanks to the principle of no-harm, it is also not so farfetched to think that the States existing in a peculiar region might reach agreements with their own neighbours to target specific issues that might concern them because of their transboundary distinctiveness (*Figure 1*). Data collected from the International Environmental Agreements Database Project shows that in the 18 years before the Conference, treaties and agreements were generally less frequent, except for those concerning freshwaters and, to a lesser extent, those concerning agriculture. The biggest gap is in fisheries, pollution and treaties concerning habitats and oceans.

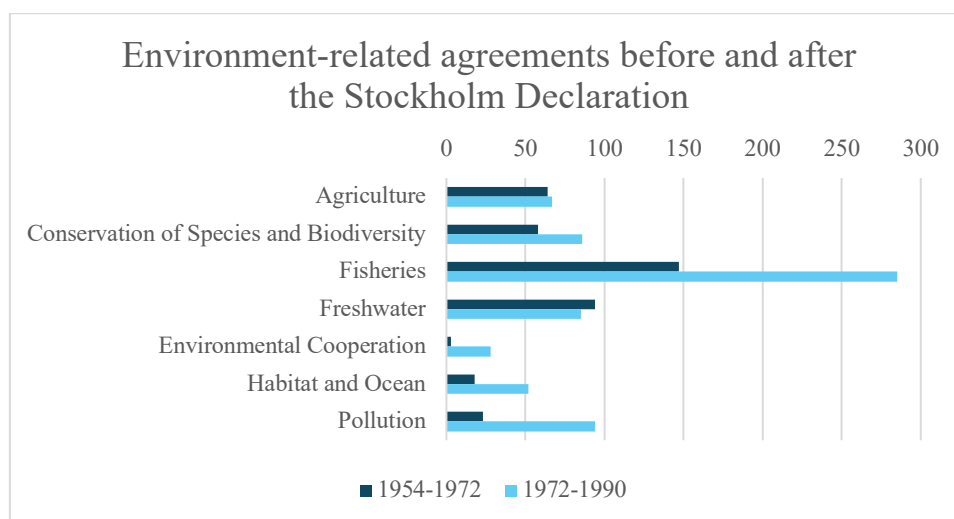


Figure 1. Time frame of 18 years before and after Stockholm Conference. Data taken from <https://www.iea.ulaval.ca/en/agreements>

Once again, the Conference took place during a tumultuous time and many States would probably try to avoid further conflicts with their own neighbours by cooperating on this newly emerging field that is the protection of the environment. It is also interesting to note how in

certain fields (*Figure 2*), bilateral environmental agreements (BEA) are more frequent than multilateral ones (MEA).

An emblematic example of an early development of regional environmental cooperation after the 1972 Convention, is the *Bern Convention* of 1979, which entered into force in 1982. Formally known as the Convention on the Conservation of European Wildlife and Natural Habitats, it was promoted by the Council of Europe. In its preamble, it mentions the Stockholm Conference and throughout the entirety of the text it stresses more than once the importance of achieving the aim of the Convention - that is, to ensure the conservation of Europe's wild flora and fauna, while encouraging the Member States to collaborate with each other to do so (Preamble para. 3, para. 9, art. 11). It is a binding document, requiring the party members to develop national policies aimed at conservation, knowledge dissemination, native flora and fauna reintroduction, habitats protection, prohibition of capturing and killing of certain species (Art. 3, art. 3.3, art. 9.1, art. 4, art. 6). It is, in a sense, a surprising episode because the European Union was conceived as an economic union – but the Bern Convention gave it an impetus and subsequently produced several other environmental agreements and also policies.

It is relevant to note how the development of environmental agreements has created a subfield on the matter, the so-called International Environmental Law (IEL). There is no actual comprehensive codex of IEL, no catch-all treaty with a specific set of norms and articles. The expansion and evolution of environmental protection has created a series of areas of interest that one could group this way: agriculture (land management); conservation of species and biodiversity; fisheries; freshwater; habitats and oceans; environmental cooperation (climate change and sustainability); pollution (air, waste and chemical management) (*Figure 1*). Each of these has been thoroughly developed and has been enshrined in different significant agreements, and interestingly, like the Bern Convention, most of them recall either the Stockholm Conference or the subsequent Rio Declaration within their bodies of text. As a result of the thematic areas development, more and more regional and international agreements have been agreed on, ratified or implemented: from protecting an area sprawling thousands of kilometres to protecting a flowing stream and its inhabitants that happen to cross a national border (*Figure 1*). The development of regional environmental protection comes as no surprise. While international agreements covering said areas of interests are plentiful, sometimes there is a need for a more *specific* agreement for a very *specific* area. Pertaining to the topic of this thesis is decisively the creation of the Arctic Council. As a result of several previous regional

environmental agreements, most of them inspired by the first international environmental conferences, the Arctic States reached a consensus on the need for a formal agreement and in 1996 the Arctic Council was officially founded. Signed in Ottawa, in its institutionalising declaration, similarly to the previously mentioned Bern Convention, it stresses the importance of regional cooperation “*to commit to the protection of the Arctic environment*” (Arctic Council, 1996, p.2).

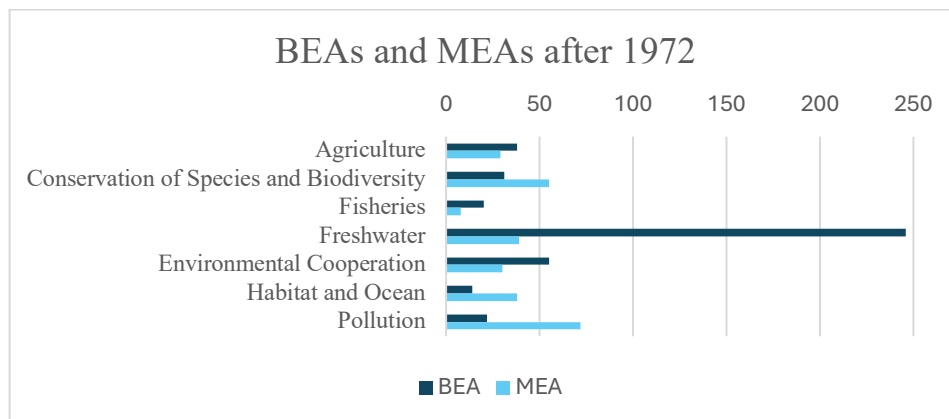


Figure 2. Time frame of 18 years after the Stockholm Conference, focusing on the amount of BEAs and MEAs. Data taken from <https://www.iea.ulaval.ca/en/agreements>

Following the Stockholm Conference and the institutionalising of the no-harm principle within its body, there is another important environmental principle: the Precautionary Principle (PP). It was first officially mentioned in an international setting within the various North Sea treaties of the 80s and early 90s, culminating with Principle 15 of the Rio Declaration, and finally with the Communication from the (European) Commission on the PP in the year 2000. Whilst there is not an agreed definition of the Precautionary Principle, the European one seem to offer a more comprehensive protection on environmental matters since it claims it should be invoked “[...] where scientific evidence is insufficient, inconclusive or uncertain and preliminary scientific evaluation indicates that there are reasonable grounds for concern that the potentially dangerous effects on the environment, human, animal or plant health may be inconsistent with the high level of protection” (Commission of the European Communities, 2000). The PP is especially important to the matters of the environment as it preaches that instead of trying to deal with the consequences of hazardous events for the environment, it tries to protect it against said events with anticipatory measures. It is a ‘pre-damage’ control instead of a post-damage one (UNESCO, 2005, p.7).

If environmental principles are held in high regards, they become fundamental to the furthering of international environmental cooperation, and possibly even more relevant for regional environmental cooperation as a more localised application can hold better result than a broader one (Council of Europe, 2023). Regional instruments and organisations will probably have less troubles controlling that there are no violations as the number of actors involved is smaller; furthermore, it is easier for civic societies or local activists to participate and be involved actively as there are probably less steps to be taken from a bureaucratic point of view. Lastly, but not least, informing the public of dangers or to raise awareness on certain issues is, again, easier on a smaller scale. If a regional NGOs wants to raise awareness, there are many ways to do so on a regional and more localised level, between universities, local newspapers and other telecommunication channels, and the good old-fashioned manifests printed and glued all over the place. At the same time, regional cooperation can flourish in specific settings. As previously stated, the European Union is one of these. While Member States have given up a share of their own sovereignty in the hands of the Union, they have certain freedoms within specific areas – and the environment is one of these areas where the EU and Member States can both legislate (European Union, 2012, art. 4 TFEU). The EU – generally speaking – sets minimum standards or procedural requirements, that the Member States can either follow or enhance by introducing more stringent measures. If a country decides to develop a plan to make a specific sector pertaining to the environment flourish, sometimes it is better to act in coordination with neighbouring countries than alone. Emblematic to this is the Interreg instrument: co-funded by the European Union, it is an instrument that “[...] strengthens cooperation between regions and countries within the EU” (Interreg, 2021). While it was conceived as a way to boost economic prosperity, as European instruments tend to be, one of its major focuses is to address climate change. It is part of the European Union Cohesion Policy, also called European Regional Policy, which aims at boosting, again, economic prosperity of its Member States by reducing disparities and trying to bring everyone on the same level (European Commission, 2021a). By allocating significant funds, it aims at pushing cooperation between specific European areas and beyond. Interestingly, one could draw a positive link between the environmental standards set by the European Union and the interest that non-EU countries have shown in joining, either as future members or trade partners. By developing a standard, if a non-EU country wants to interact with it, they inevitably have to bring their own environmental policies up to said standard (COM/2022/409, 2022).

What might happen if environmental standards – in a domino effect – become so widespread and internationally acknowledged that they become the norm all over the world? There have been discussions on considering a future environmental aspect of *jus cogens* – or at least, something that comes as close to it as possible (Carr & Scott, 1999). The definition of *jus cogens*, also known as peremptory norm, is that of a norm that cannot be derogated and can only be amended by a subsequent norm having the same authority (United Nations, 1969, art. 53). For a norm to be considered *jus cogens*, its peremptory effects have to be considered as such by the international community (Legal Information Institute, 2023). Because of this acceptance, *jus cogens* can be viewed as customary law, that is, a general practice that has been recognised as law by the international community.¹ Its characteristics are two: State practice and a psychological aspect called *opinio juris*, where a State acknowledges the law in question to be binding. Customs are an established, widespread and consistent practice of a behaviour that States recognise as such, making it obligatory (Evans, 2018, p. 98). A fascinating concept that is oftentimes quoted when speaking about environmental customary law, is that of ‘*instant*’ customary law. Coined by Zhèng Bīn, a sino-british legal scholar, he claimed that the first characteristic of customary law is not necessary to create customs, only *opinio juris* is needed.² To fortify this notion, we could look at what the ICJ stated in the *North Sea Continental Shelf* case of 1969: “With respect to the other elements usually regarded as necessary before a conventional rule can be considered to have become a general rule of international law, it might be that, even without the passage of any considerable period of time, a very widespread and representative participation in the convention might suffice of itself, provided it included that of States whose interests were specifically affected” (Judgement, p. 42, n. 73). Similarly to what Zhèng Bīn claimed, only the psychological aspect is needed. It follows that “Although the passage of only a short period of time is not necessarily, or of itself, a bar to the formation of a new rule of customary international law on the basis of what was originally a purely conventional rule, an indispensable requirement would be that within the period in question, short though it might be, State practice, including that of States whose interests are specially affected, should have been both extensive and virtually uniform in the sense of the provision invoked; – and should moreover have occurred in such a way as to show a general recognition that a rule of law or legal obligation is involved” (p. 43, n. 74). Once more, only the willingness of States to accept a practice is needed to make it customary. Going back to regional environmental cooperation it is not too farfetched to consider a timid birth of customary law if

¹ But not the contrary: if *jus cogens* is customary law, not all customary law is *jus cogens*.

environmental standards become widespread because States accept them as a practice to be followed. As mentioned before, to trade with the EU, non-EU States have to follow a specific set of rules. For example, many non-EU markets had to switch to non-animal testing to be able to sell cosmetics within the EU. Therefore, there is a willingness to adapt to laws that are not inherent to their national customs and, consequently, a willingness to adopt European values.³ Could this be a fledgling sign of a possible creation of customary law? While many point out that the regional aspect is not as relevant, there is a widespread acceptance and a willingness to incorporate these practices. There is, as well, an academic debate over the topic of environmental *jus cogens*. Generally, there is a doubt over a possible adoption of environmental peremptory norms.⁴ Those who attempt to find a solution oftentimes group them under already established *jus cogens* – it is a matter of re-interpreting what is already available.⁵

So why IEL, something that is greatly needed to overcome climate change and its disastrous consequences, is not considered as such? Even with the presence of widely accepted international principles like the PP, or the no-harm principle, and the plethora of Multinational and Bilateral Environmental Agreements there is still no move from the international community to consider them customary law. IEL is a rather young legal field, renowned only after the Stockholm Conference, and is considered underdeveloped by many, such as Kotzé (2016, p. 253). Interestingly, in his considerations of the existence of environmental *jus cogens*, Kotzé draws the focus on the difference between IEL and (classic) IL: the latter is widely State- and anthropocentric, while IEL is, for the most part, ecocentric. While customary law and *jus cogens* have been accepted internationally, the issue is that many might see IEL and environmental peremptory norms as a threat to their sovereignty. Most international environmental agreements are not of a binding nature, and States have consented to adhere to them – creating environmental *jus cogens* might trigger a negative reaction and thus stop any kind of environmental cooperation, be it international or regional. Every State has the right to exploit their resources however they want, and it is only their willingness to follow MEAs that has put a limit on over-exploitation. Presumably, if a general acceptance on the limits of

³ By writing European values I oversimplified and regrouped all the policies, regulations, directives, etc. that make the EU what it is today.

⁴ Authors such as Hannikainen L. (1988) Peremptory norms (*jus cogens*) in international law: historical development, criteria, present status; Singleton-Cambage K. (1995) International legal sources and global environmental crises: the inadequacy of principles, treaties and custom; Kadelbach S. (2006) *Jus cogens*, obligations *erga omnes* and other rules: the identification of fundamental norms.

⁵ Hannikainen L. (1988) proposes a reinterpretation of the prohibition of aggressive use of force, which is customarily seen as *jus cogens*. His reasoning is that armed conflicts can pollute the environment.

resource extraction was to be discussed, surely each State would have a different threshold and thus it would be impossible to reach a binding agreement.

In the next sections and chapters, the double-edged sword that is environmental protection and its application will be highlighted – and why so many States are reticent in giving priority to the environment.

2. International Environmental Legal Framework

In the previous section the most important environmental agreements were introduced, and this and the next sections will focus on extrapolating the passages that are more relevant to the topic of this thesis. First, there is the Stockholm Conference on the Human Environment of 1972. As previously mentioned, the Conference gave birth to the UNEP – and highlighted the relationship between the environment and development, and thus the concept of sustainable development became more and more prominent all over the world. Sustainable development is a concept that balances economic growth, social progress, and environmental protection. It aims to meet present needs without compromising future generations' ability to do the same. This involves addressing issues like poverty, inequality, and climate change while ensuring a healthy planet (World Commission on Environment and Development, 1987). Most of the principles contained in the Stockholm Declaration refer to the 'right of future generations' to enjoy, very succinctly, their life on Earth: every man has "[...] the *fundamental right* to freedom, equality and adequate conditions of life, in an environment of a quality that permits a life of dignity and well-being" – and every man should act in a conscious way that permits others to enjoy this fundamental right as well (UN, 1972, principle n. 1, proclamation n. 7). On the other hand, the Declaration also underlines the importance of cooperation between States and civic societies to attain the goal of the Declaration, that is, to preserve the environment for everyone to enjoy. In the text there is a strong accent on resource extraction and exploitation. As previously mentioned, resources are oftentimes national matters and States have a right to dispose of them as they want. At the same time, there is a strong link between a healthy environment and resource extraction and exploitation. Principle 2 declares that natural resources should be safeguarded, followed by Principle 5, 12 and 17, all evoking the importance of responsible resource extraction. States typically resist external interference in their domestic affairs, perceiving such actions as a violation of their sovereignty, especially in the matters of resources. As a general principle of IL, States have the right to exploit their own resources (UNGA, 1962). Of course, the Declaration underlines this right in Principle 21 and

adds that States have a “[...] responsibility to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or of areas beyond the limits of national jurisdiction” (UN, 1972, principle n. 21). There is a stress on *not harming* their own neighbours, possibly because of the tumultuous times the document was written. Likewise, the UNEP and the UNGA followed with a resolution in 1973, where the importance of a harmonisation and cooperation between States to exploit shared natural resources was highlighted (RES 3129). Similarly to the Stockholm Conference, it is not a binding agreement – but rather an exhortation to follow its principles. Still, by then and today as well, there is no way to force States to follow and adhere to these exhortations.

As previously mentioned, after the Stockholm Declaration, an increasing number of MEAs and BEAs began to proliferate, and environmental issues became more and more specific, creating a need to focus on specific targets. An issue that ran rampant throughout the 70s was that of pollution: of the air, land, and water. It is of no surprise that many governments pushed agendas forward to create instruments to curb the problem.⁶ In the 1980s, because of the severity of the situation, the international community met to address the issue of pollution and produced the Vienna Convention for the Protection of the Ozone Layer. It was followed, in 1987, by a binding document: the Montreal Protocol. Studies (Fowler, 2020) showed that the situation was worse than what was perceived, and in the 1990s the international community decided to phase out the use and production of pollutants, called Ozone Depleting Substances (ODS), such as halon gases and chlorofluorocarbons (CFC). As of today, the issue is still not fully solved as pollution runs rampant on our planet and the danger of certain substances are discovered continuously decades after they were first used. Hydrofluorocarbons (HFC) and hydrochlorofluorocarbons (HCFC) were introduced as a substitute during the phasing out of CFC, but recent scientific discoveries pointed out that they are not to be underestimated: the parties of the Montreal Protocol, in 2016, met in Kigali, Rwanda, to amend the protocol and introduce a phase out of HFCs by the 2040s. Needless to say, thanks to the Montreal Protocol, ODS and Greenhouse emissions have been reduced significantly and it is a very promising instrument to curb climate change. It is also relevant to add that within the preamble of the Montreal Protocol, the precautionary principle is once again mentioned, “[...] determined to protect the ozone layer by taking precautionary measures to control equitably total global

⁶ Despite it being a very tense decade (as it was the middle of the Cold War), industries all over the world were flourishing and producing as much as they could after the so-called economic boom of the 60s. But back in the day probably no one thought about producing using sustainable or clean energy, which worsened the quality of the air, land, and water. An example is the U.S.’ Clean Air Act of 1970.

emissions of substances that deplete it, with the ultimate objective of their elimination on the basis of developments in scientific knowledge, taking into account technical and economic considerations and bearing in mind the developmental needs of developing countries” (United Nations Environmental Programme, 1987).

There are some considerations to be made about the efficiency and success of this instrument. First of all, some States and their governments are not prone to ratify or even agree on a document, especially binding ones, concerning the environment unless they are directly affected or if there are some economic implications (Lupu, 2016). In this case, it is quite impossible to flee or hide from radiations coming through a severely depleted and thinned Ozone layer – therefore, affecting everyone and not only some remote part of the world. The hole in the ozone layer is currently located in Antarctica, and it is closely monitored by scientists and governments alike (NASA, n.d.), as a possible environmental degradation of the poles can and will affect the entire planet.⁷ Secondly, it is a binding instrument – very different from the majority of environmental agreements. States are bound to follow the parameters enshrined in the Protocol, and to act in accordance with them. Not surprisingly, the Protocol was an absolute victory: 197 nations in total have ratified it.⁸ The last amendment, the Kigali Amendment, which updated the Protocol on the dangers of HFC – not greenhouse gases, but still incredibly dangerous for the environment – was not ratified by all nations at the time it was conceived.⁹ It took a few years, but finally the most productive countries in the world, namely the United States of America, China, and India, agreed and ratified the Amendment.¹⁰

The Montreal Protocol, because of its binding characteristic, follows the Vienna Convention in case of disputes and non-compliance of one of the party members. Additionally, a ‘Meeting of the Parties’ is convened to discern if a member is not complying with the protocol and give appropriate assistance – technical, scientific or financial – to warn them and to suspend the accused party, “[...] in accordance with the applicable rules of international law concerning the

⁷ This will be later explored in the thesis, but in short: the melting of the ice will increase temperatures worldwide, increase the sea level and consequently invoking intense weather events that can cause extreme damages.

<https://www.worldwildlife.org/pages/six-ways-loss-of-arctic-ice-impacts-everyone>

⁸ 197 Nations plus the European Union. <https://ozone.unep.org/all-ratifications>

⁹ “To replace the CFCs and HCFCs, manufacturers developed a new generation of coolants, the hydrofluorocarbons, or HFCs. These chemicals don’t damage the ozone layer, but it turns out that they are bad for the climate – very bad. Many of them cause between 1,400 and 5,000 times more warming in the atmosphere than carbon dioxide, according to a scientific finding that came in time to prevent their pouring into the atmosphere at dangerous levels.”

<https://news.mongabay.com/2021/05/the-hfc-challenge-can-the-montreal-protocol-continue-its-winning-streak/>

¹⁰ In order it was written, 2022 - 2021 - 2021.

https://treaties.un.org/pages/ViewDetails.aspx?src=TREATY&mtdsg_no=XXVII-2-f&chapter=27&clang=en

suspension of the operation of a treaty, of specific rights and privileges under the Protocol, whether or not subject to time limits, including those concerned with industrial rationalisation, production, consumption, trade, transfer of technology, financial mechanism and institutional arrangements” (United Nations Environmental Programme, 1992a).

Prior to the Montreal Protocol, but still related to the issue of pollution, are several treaties of a binding characteristic. The first of many treaties on conservation of the flora and fauna from degradation, and therefore pollution, is the 1971 *Ramsar Convention on Wetlands of International Importance Especially as Waterfowl Habitat*, or simply, Convention on Wetlands. As of today, 173 countries have signed the treaty and designated wetlands within their borders to be protected. The document itself opens with a statement that has been highlighted several times in the thesis, “The Contracting Parties, recognising the interdependence of Man and his Environment [...]” (United Nations Educational Scientific Cultural Organisation, 1971, preamble). Once again, the international community has started to realise that the environment, and therefore humans as well, are in danger if they do not do something to stop or at least curb pollution, as environmental changes are transboundary. Wetlands are a common ecosystem that can be found all over the world, and they provide, very succinctly, life. The Convention itself is very broad on what it defines as wetlands, to protect as many ecosystems as possible: lakes, rivers, underground aquifers, swamps and marshes, wet grasslands, peatlands, oases, estuaries, deltas and tidal flats, mangroves and other coastal areas, coral reefs, and all human-made sites such as fishponds, rice paddies, reservoirs and salt pans (Article 5). Wetlands are essential to resist climate change degradation: wetlands can store clear water, essential when droughts happen and, at the same time, they protect from extreme weather events such as flooding and storms. Wetlands also provide habitats for several species of animals, migratory or autochthonous, and they also provide a safe haven for them. Consequently, the title of the Convention mentions the Waterfowl, a group of birds that comprises about 180 species. They, like most birds, are migratory animals and will cross borders – therefore, cooperation between States is needed to protect not only the animal itself but also its habitat. The aforementioned UNGA-UNEP Resolution of 1973 applies in this case, as wetlands can be transboundary and be shared between two or more States. This is exemplified by Article 5 of the Convention on Wetlands: “The Contracting Parties shall consult with each other about implementing obligations arising from the Convention especially in the case of a wetland extending over the territories of more than one Contracting Party or where a water system is shared by Contracting Parties. They shall at the same time endeavour to co-ordinate and support present and future

policies and regulations concerning the conservation of wetlands and their flora and fauna”. There is also a strong emphasis on resources, as they are rife with them but also because wetlands, such as rivers, are used for economic purposes and other services like transportation.

Two other legally binding documents pertinent to the topic of pollution, and thus to the issue of flora and fauna protection, are the 1972 *Convention on the Prevention of Marine Pollution by Dumping of Wastes and Other Matter*, or London Convention, and the 1973/78 *International Convention for the Prevention of Pollution from Ships* (MARPOL). Both of them put great importance on the preservation of the oceans from man-made pollution, whether it is accidental or not, and are sponsored by the International Maritime Organisation (IMO). The London Convention covers all kinds of marine pollution from waste generated by vessels, platforms and aircrafts and comprises several Protocols and Annexes. One of the Protocols is the London Protocol, written in 1996 with the intent to substitute, and upgrade, the text of the original 1972 convention. It is very interesting to note how within the protocol we can find codified two environmental principles: the precautionary principle and the polluter pays principle. Following the concept of both principles, the 1996 Protocol forbids *any* kind of waste thrown into waters, save for a few that are listed as reversible in a specific list. More specifically, Article 3 states that States “[...] shall apply a precautionary approach to environmental protection from dumping of wastes or other matter whereby appropriate preventative measures are taken when there is reason to believe that wastes or other matter introduced into the marine environment are likely to cause harm even when there is no conclusive evidence to prove a causal relation between inputs and their effects” (para. 1). Similarly to the instruments aforementioned in this section, in the preamble of the London Protocol there is a stress on international and regional cooperation as matters of the environment transcend borders and there needs to be cooperation to preserve the (maritime) environment, so that future generations will be able to enjoy it as well – “[...] further international action to prevent, reduce and where practicable eliminate pollution of the sea caused by dumping can and must be taken without delay to protect and preserve the marine environment and to manage human activities in such a manner that the marine ecosystem will continue to sustain the legitimate uses of the sea and will continue to meet the needs of present and future generations” (preamble). The MARPOL has a similar aim, and it was created as a way to curb these accidents caused by vessels that irreparably damage the environment. The Stockholm Conference, in which both the London Convention and the MARPOL were discussed, highlighted the issue of maritime transportation of hazardous materials and of spillages in case of accidents. Similarly to the London

Convention, MARPOL has several annexes and protocols whose aim is to update the list of banned, or restricted, materials that can be carried or used on maritime vessels.

Another milestone for MEAs is the *Rio Declaration on Environment and Development* of 1992, a product of the *United Nations Conference on Environment and Development* (UNCED). It is, in a sense, alike to the Stockholm Declaration as it is a non-binding document – but it still is the product of international cooperation and the willingness to protect the environment. The Declaration lists 27 principles that should be taken into account when dealing with the environment and its protection on an international and regional level. It was a proficient Conference, as it gave birth to the *United Nations Framework Convention on Climate Change* (UNFCCC), the 1992 *Convention on Biological Diversity* (1992b), and the 1994 *United Nations Convention to Combat Desertification*. The latter two are legally binding, while the first can produce protocols that can be binding. The Rio Declaration can be considered to be an updated version of the Stockholm Declaration as States recognised that the transboundary characteristic of the environment is not only on a physical level, but also on a more abstract one: the environment can have repercussions on social and economic aspects. The need for sustainable development is emphasised throughout the entire declaration and its principles, as well as the need to protect the environment for future generations (UNCED, 1992, principle n. 3). Interestingly, the Declaration mentions the importance of women, youth, and indigenous populations in matters related to the environment, as well as the effect that warfare has on the land (principles 20 – 24). The issue of indigenous populations will be analysed in the next sections, but it is very important to stress how this is a monumental milestone for indigenous populations all over the world, as they have scantily been mentioned under a positive light in international documents. In brief, the environment is transboundary, and it encompasses all strata of societies, affecting the entire world in various forms, and international cooperation is needed to accelerate sustainable development.

This line of thought – of cooperation – produced the UNFCCC, an international treaty that is not binding in and of itself, but it can produce binding protocols. Its aim is to prevent and curb man-made interference with the climate system, by stabilising “[...] greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system” (UN, 1992a, art. 2). Once again the protection of the environment for future generations is enshrined at the beginning of the text, in article 3, and in the same article the PP is clearly mentioned: “Where there are threats of serious or irreversible

damage, lack of full scientific certainty should not be used as a reason for postponing such measures, taking into account that policies and measures to deal with climate change should be cost-effective so as to ensure global benefits at the lowest possible cost” (art. 3.3). As we can notice in this quote, in the remarking of the existence of costs and benefits and throughout the entire convention, the economy is mentioned several times. It clearly accentuates the interconnectedness of the economy and the environment.¹¹ Costs and benefits, though, are not seen in a good light for many reasons as extra profits under the guise of development run rampant in our societies.¹² Nonetheless, this Convention and its principles are a milestone for environmental protection and climate change mitigation.

The most notorious results of the UNFCCC are the Kyoto Protocol and the Paris Agreement. The first was approved in 1997, when States reached a consensus on reducing greenhouse gas emissions (GHG) as scientific evidence found that anthropogenic CO₂ emissions were the driving force behind the deterioration of the climate. In 2005 it entered into force with over 192 party members. The Protocol underlines the concept of common but differentiated responsibilities, meaning that each country can and should combat climate change as they have the economic possibility to do so and it also places a weight on the shoulders of developed countries, as historically they are the biggest producers of GHG emissions. We can see here a hint of the polluter pays principle, albeit it is more focused on forcing polluters to curtail emissions rather than paying. The main goal of the Paris Agreement of 2015 is to lower the global temperatures by cutting GHG emissions, and to promote climate change mitigation and adaptation. The difference between the Kyoto Protocol and the Paris Agreement is that the latter does not focus on the distinction between developed and developing countries, as both of them are requested to submit their work and contributions on climate change mitigation and adaptation.

It is clear that governments and Nations cannot solve environmental problems alone. Because of the transboundary characteristic of the environment, all *strata* of societies are involved if something happens to it. This introductory section only highlighted the most important international documents on the matters of the environment, but there are several more whose aim is to protect the planet. The Stockholm Conference and Declaration were the first milestone

¹¹ Within the text, the economy is brought up 48 times, and climate change 49 times.

of many, and it opened the doors to a wider participation in the protection of the environment: for the first time, on such a high level, civil societies, NGOs, the scientific community, and the private sector were directly involved – and it set a trend for the subsequent multilateral environmental agreements (Nilsson, 2004). It is of no wonder that during the Earth Summit – which produced the Rio Declaration – more groups were welcomed, such as the Indigenous populations, recognising that they could offer more insight in how to deal with climate change mitigation and environmental preservation. But despite this positive outcome, multilateral environmental agreements do not seem to work at one hundred percent. As previously stated, the vast majority of MEAs are not legally binding and even if they were, some States could decide to withdraw from environmental agreements if they wished to do so.¹³ Other States, if a change of government happens, can decide to defund climate change mitigation and environmental protection, and instead invest that money in something else. Or they could even invest in environmental programmes, but said investments bring more capital within the pockets of a selected few rather than bringing benefits to the society or smaller communities. In the next section the interconnection between the environment and humans will be introduced, and how the development of environmental programmes can either help or hinder human rights.

2.1 Environmental Rights and the full enjoyment of Human Rights nexus

As mentioned, the international environmental legal framework has evolved since its conception, and it now also deals with other areas such as the economy, development, businesses, societies, and everything related to human activities, including human rights (Reviel, 2021, p. 335) Again, it is a direct effect of the transboundary characteristic of the environment which encompasses societies and everything it entails. Because of this, the participation of civic societies and private enterprises comes to no one's surprise, bringing light to the threats that incur against specific parts of the population as some are more susceptible to environmental events than others.

How is the environment linked to the full enjoyment of human rights? First of all, their development and evolution go hand in hand, and one could argue that you cannot have one without the other (UNGA, 2012; 2021). For the sake of this argument, both the International Covenant on Civil and Political Rights (ICCPR) and the International Covenant on Economic,

¹³ i.e. Trump's infamous withdrawal from the Paris Agreement in 2020. He is a strong non-believer of climate change and called it a hoax several times. The USA re-joined the Paris Agreement in 2021.

Social and Cultural Rights (ICESCR) will be taken in consideration as these have been ratified by most countries in the world and can be applied universally. Neither of them actually mentions the environment and its relation to human rights, but many experts and courts have been interpreting the Covenants' articles to achieve environmental-related goals – as both of them were written in 1966 there is no doubt that these rights have evolved in time, as they tend to do (Narváez & Patarroyo, 2016). The concept of re-interpreting existing laws and rights to make them fit to the environmental situation at hand is called *greening* (Atapattu, 2019), and as Morrow reports in her contribution to the 2021's Research Handbook on International Environmental Law, “[...] when rights claims are deployed in this area, they tend not to invoke ‘environmental human rights’ as such, but rather already established human rights”. On an international level there is no framework for environmental rights – or at least, there is nothing that is internationally recognised as such – so most of what is available derives from complaints brought before domestic or international courts (Gerrard & Wilensky, 2016), in cases of climate change or environmental litigations, and from re-interpreting already existing human rights laws.

The United Nations are the most relevant body on an international level for matters related to the environment because of the role the organisation played in the early dissemination of environmental conventions and because of the several instrument it disposes of – as well as the fact that most countries are members of it. It has been observed that in the Stockholm Conference, the first principle found in the text of its Declaration says: “Man has the fundamental right to freedom, equality and adequate conditions of life, in an environment of a quality that permits a life of dignity and well-being and he bears a solemn responsibility to protect and improve the environment for present and future generations”. It is then followed by the first principle found within the text of the Rio Declaration, which states that “Human beings are at the centre of concerns for sustainable development. They are entitled to a healthy and productive life in harmony with nature”. Both declarations are soft law instruments as they are not binding, but their relevance in the evolution of the environmental framework that followed is valuable. In 2012, the United Nations Human Rights Council established the mandate for an independent expert on the matters of human rights and the environment, thus creating the role of a Special Rapporteur on Human Rights and the Environment (UNGA, 2012). This enshrined the evidence that humans, and human rights, are intrinsically linked to the environment while also carefully pointing out that “[...] certain aspects of human rights obligations relating to the enjoyment of a safe, clean, healthy and sustainable environment

require further study and clarification”. The United Nations have come a long way since the latter direct quotation, and after a decade, in 2022 the United Nations General Assembly has recognised that a clean, healthy, and sustainable environment is a human right (A/RES/76/300). It is however interesting to note how the African Charter on Human and People’s Rights of 1981 and its Article 24 precedes several ‘Western’ documents, by asserting that “All peoples shall have the right to a general satisfactory environment favourable to their development”.

After these considerations, how are the environment and human rights linked? Before the recognition of a right to a clean, healthy, and sustainable environment – as previously mentioned – many committed to the *greening* of already existing rights to advance the environmental agenda (Atapattu, 2019). The comment made by Judge Christopher Weeramantry, former Vice-President of the International Court of Justice, apropos of the *Gabčíkovo-Nagymaros Project (Hungary v. Slovakia)* case is emblematic. In a separate opinion, the judge affirms that “The protection of the environment is likewise a vital part of contemporary human rights doctrine, for it is a *sine qua non* for numerous human rights such as the right to health and the right to life itself. It is scarcely necessary to elaborate on this, as damage to the environment can impair and undermine all the human rights spoken of in the Universal Declaration and other human rights instruments” (ICJ, 1997, pp. 91-92). The right to life, for example, can be threatened because of a lack of clean water or lack of clean air.¹⁴ It is not a conclusion drawn out of nowhere, as data collected in 2019 showed that pollution caused over 9 million premature deaths around the world – with polluted water killing 1.6 million and polluted air 6.7 million (Fuller et al., 2022). Even the thinning of the Ozone layer could be seen as a threat to the right to life, especially seeing how all of the three examples that were previously made have an anthropogenic origin. Through the United Nations Resolution 64/292, access to clean water has been declared a human right and one of the characteristics it needs to have, is that it should be safe.¹⁵

Another example worth mentioning is how a depleted and polluted environment can threaten the right to food – another human rights – which is enshrined in both Article 11 of the ICCPR and Article 25 of the Universal Declaration of Human Rights. In both cases, the wording of the Articles stresses that to live in a dignified way there needs to be access to food, housing, and medical care – conditions that can, without a doubt, be threatened with the worsening of

¹⁴ The Right to Life is present in several charters, but most importantly in the Universal Declaration of Human Rights (Article 3) and in the International Covenant on Civil and Political Rights (Article 6.1).

¹⁵ Water has to be sufficient, clean, acceptable, physically accessible and affordable.
https://www.un.org/waterforlifedecade/human_right_to_water.shtml

environmental conditions. Housing also implies the right to private property that can, again, be threatened (Grinlinton, 2023).

Furthermore, the *Family Farmers and Greenpeace Germany v. Germany* case is of a similar nature: in 2018 a group of German farmers argued that their right to life and private property were threatened by the inaction of the German state in curbing air pollution and GHG emissions. More specifically, they argued that the target set by the German authorities to reduce greenhouse gas was not enough – instead of settling with a reduction of 32% they should have aimed higher, at 40%, and demanded the government to do more (Berlin Administrative Court, 2019). Agriculture, farmers, and those who sustain themselves autonomously are fully dependent on nature and natural resources, such as clean water or clean soil, to produce – and to survive. Aside from pollution, climate change and extreme weather conditions can ruin an entire harvest, leaving people without means of sustenance, from a monetary point of view but also from a nutrition point of view. The farmers used this rationalisation to sue the State, seeing that many of them own organic farms and have witnessed the consequences of extreme weather conditions themselves. In 2019 the Berlin Administrative Court gave judgement and dismissed the case, but it did deliver some points that are worth mentioning. First of all, the Court recognises that some of the complainants’ fundamental rights – right to life and physical integrity, right to property – are being violated. Second, the Court recognises that “[...] by failing to implement the 2020 climate protection target, the defendant is indirectly and de facto encroaching on the scope of protection of Article 14.1 of the Basic Law [...]. This would intensify and further advance anthropogenic climate change and thus also regional environmental degradation. The defendant is aware of this complex process” (p. 5, para. 1). Regrettably, the Court also states that there is no scientific evidence of the relation between the missed implementation of the 2020 climate protection target and the violations of the complainants’ fundamental rights. Indeed, climate change does affect the farmers and their rights, but it is not the fault of the missed target, as the Court claims that the plaintiff “[...] have not conclusively demonstrated a violation of the Federal Government’s fundamental duty to protect the climate” (p. 18, para. 3). At the same time, the farmers accused Germany of failing to fulfil its constitutional duty, that is, to protect the rights of its citizens; it should do everything in its powers to protect said fundamental rights and thus, it should do its best to meet the target of the 2020 climate protection instead of abandoning it. Regardless of the outcome, the Court has raised several points in its commentary such as claiming that the international community has not progressed that much in the past three decades in terms of climate change mitigation

and the application of the legislations aimed at reducing greenhouse gas emissions – and also that States have the legal obligation to reduce greenhouse gas emissions with the “highest possible ambition” (p. 6, para. 2). From the judgement of the first case mentioned, the Gabčíkovo-Nagymaros Project case, and the judgement of the German Farmers case 22 years have passed, and the development of the belief that the environment and human rights are clearly connected.

Another angle worth addressing that is relevant to the topic of this thesis and of the current discussion, is the issue of resource management. Resources are owned by the States, and their exploitation is the core of many treaties. This concept is enshrined in the preamble of the 1962 resolution of the United Nations General Assembly (UNGA), aptly named ‘*Permanent Sovereignty over natural resources*’ (UNGA, 1962). And, more recently, it is also mentioned in relevant documents such as Principle 2 of the Rio Declaration, which recalls the sovereignty of the State over natural resources. Whether a State wants to pursue sustainable development or not, resources are needed to a – frankly terrible – extent. Wars, invasions, subjugations, and exterminations to obtain resources are the daily bread and butter of many States. It is of no surprise then that many international bodies tried to curb this violent resource grabbing. If fossil fuel extraction was considered to be, no matter what, of the utmost importance (Beaumont, P. & Walters, J., 2007), the race to obtain resources to pursue sustainable development is not that far off. In *Natural Resources Grabbing: An International Law Perspective*, the authors open the discussion by claiming that resource extraction, also called grabbing, is often associated with practices that impact negatively on the environment and its inhabitants, whether they be animals or humans (Jacur et al. 2015, p. 2). Of course, while States have permanent sovereignty on their resources, they also have to comply with already existing and binding obligations, such as the respect of human rights. The UN Resolution 1803 clarifies how resources should be managed in a way that brings benefits to the State’s own development and to the State’s own people (UNGA, 1962). Resources, because of their importance, are considered to be *wealth*,¹⁶ a State’s *subsistence*: they power the State itself, and they are also used economically – fairly exchanged and sold, or used as a bargaining chip. As the thesis will show, resources are quintessential for the survivability of States, and for the advancement of several agendas, such as the green transition or the energy transition – but not every State has all the resources needed

¹⁶ *Ibid.* “Considering that any measure in this respect must be based on the recognition of the inalienable right of all States freely to dispose of their natural wealth and resources in accordance with their national interests, and on respect for the economic independence of States”.

within their borders and have to resort to trading and commerce to obtain them. Resources are plentiful in certain areas, and as it happens, many of them can be found in the Global South or within Indigenous Lands. Many rights – environmental and human rights, for instance – are overstepped in the quest of securing a supply of resources, and some of these rights are more recent ones.

The Rights of the Indigenous Populations have developed in the last decades, alongside the evolution of environmental rights (Alfredsson, 2010). Indigenous Lands contain a significant amount of resources that are needed to sustain several needs, such as oil fracking, logging, hunting, the construction of high-voltage powerlines, hydroelectric energy, and many more (Grogan et al., 2011; Cannon, 2020). Indigenous populations have a right to develop their lands as they see it fit, but governments do not agree in the eyes of the immense economic investments that can be done usurping resources found in Indigenous lands (*Prophet River First Nation v. British Columbia*). It is not a coincidence that Indigenous populations are oftentimes at the forefront of environmental protection movements, and not only their lands are being exploited without their consent to supply the climate mitigation agendas, but also because they are more prone to be affected by climate change itself.

2.2 Environmental Rights and the Indigenous Rights nexus

Indigenous populations have just recently been recognised on a level that allows them to be included into most decisions, be it on a policy-making level or a governmental one. At the same time, their inclusion on an international level was also long awaited. Considering the most relevant international legal documents that have been mentioned in the research up till now, Indigenous peoples have not been mentioned within the Stockholm Declaration, nor within the subsequent Programme for Action. On the other hand, the Rio Declaration on Environment and Development of 1992 explicitly mentions them. Principle 22 of said declaration states that “Indigenous people and their communities and other local communities have a vital role in environmental management and development because of their knowledge and traditional practices. States should recognize and duly support their identity, culture and interests and enable their effective participation in the achievement of sustainable development” (UN, 1992b).

There are three very important documents for international Indigenous Rights, two of which are legally binding conventions produced by the *International Labour Organisation* (ILO). Said ILO Conventions, namely the *Indigenous and Tribal Populations Convention* of 1957 and the *Indigenous and Tribal Peoples Convention No. 169* of 1989, are considered catalysts for the implementation of national and international policies that aim at involving and welcoming indigenous peoples on every level, but there are still some issues. It is a binding document, but, strictly speaking, only 20 countries have ratified the 1957 convention, while the 1989 has been ratified by 24 countries. It is an incredibly low number, especially considering that indigenous people can be found in over 90 countries.¹⁷

But who are Indigenous peoples? There is no agreed on definition, and neither there is an agreed on legal one, but the Indigenous and Tribal Peoples Convention No. 169, or C169, tries to give one in its very first Article: “Peoples in independent countries who are regarded as indigenous on account of their descent from the populations which inhabited the country, or a geographical region to which the country belongs, at the time of conquest or colonisation or the establishment of present State boundaries and who, irrespective of their legal status, retain some or all of their own social, economic, cultural and political institutions”. The Convention itself, in the preamble, acknowledges the evolution in terms of human rights since the conception of the Indigenous and Tribal Populations Convention of 1957, and recalls the Universal Declaration of Human Rights, the ICCPR and the ICESCR. It recognises their right to exercise control over their own institutions, economic development, and their ways of life, including their traditions and costumes. Afterwards, the preamble draws the attention to the “[...] distinctive contributions of indigenous and tribal peoples to the cultural diversity and social and ecological harmony of humankind and to international co-operation and understanding”. The Convention has been criticised by many Indigenous groups: although it has been a long time coming, the Convention itself uses a lax language, in particular it does not employ a self-determination point of view and provides weak provisions on the matters that are relevant to them, such as ownership of the land, territories and resources (MacKay, 2003). It is the issues of the land and resources that probably gathered such a low number of ratifications of the ILO C169. As previously stated, States generally do not like to give up part of their sovereignty, and while the second part of the document does not imply that, there is a passage that governments could read as an underlying threat against their sovereignty. In

¹⁷ United Nations Website. Indigenous Peoples. <https://www.un.org/en/fight-racism/vulnerable-groups/indigenous-peoples>

Articles 14 and 15, the Convention affirms that States should recognise the ownership of the lands that Indigenous people have traditionally lived on or, in case the lands have ‘shared’ ownership, their right to subsistence and the right to exercise their traditional activities should be respected. Governments are also called upon to ensure a proper identification of traditional lands and also ensure that the rights of property are properly recognised – ensuring that natural resources present on traditional lands are safeguarded. In the second paragraph of Article 15, the Convention explains that if States retain their sovereignty and ownership of resources, as it is granted by a plethora of international treaties, they “[...] shall establish or maintain procedures through which they shall consult these peoples, with a view to ascertaining whether and to what degree their interests would be prejudiced, before undertaking or permitting any programmes for the exploration or exploitation of such resources pertaining to their lands. The peoples concerned shall wherever possible participate in the benefits of such activities, and shall receive fair compensation for any damages which they may sustain as a result of such activities”.

One could argue that Articles 14 and 15 are linked to the concept of self-determination as all peoples have the right to do that, and also to the right to freely pursue their economic, social and cultural development (UN, 1966a, art. 1.1; 1966b, art. 1.1). Again, with the concept of self-determination there are issues related to them gaining sovereignty – or sharing it – but if Indigenous peoples are not able to exercise this right, inevitably there will be difficulties in progressing their economic, social and cultural rights. If they are not given the chance, or the space to practise their traditional ways, it could be seen as a violation of human rights. Another relevant point is the one raised by Article 16 of the C169 Convention, and its claiming that Indigenous people should not be forcibly relocated, and if that were to happen it should only happen with their free, prior and informed consent. Hence, the issue with resources is of a double nature: first, Indigenous people have the right to use the resources available on their land as it is their right to do so, and governments should not encroach this right; second, if governments exploit said resources, it should do it in a way that does not overexploit the reserves to the point that it might degrade the surrounding environment and might force the indigenous groups to relocate elsewhere lest they encounter hazards that might inflict negatively on their rights (Food and Agriculture Organization, 2016). For example, if a land is rich with minerals or unearthed fuels, their extraction could degrade the surrounding area if done in an uncaring manner or if overexploited. Pollution from the extraction could taint the air, the water, and the soil itself, threatening the human rights of the indigenous populations

living in the surrounding areas (FAO, 2016, p. 16; *Prophet River First Nation v. British Columbia*). If this were to happen, not only Indigenous people could be forcibly relocated from their traditional land, but they would also have to forego their traditional ways. These are both violations of Indigenous Rights.

In many documents, legal or historical ones, it has been highlighted several times that Indigenous peoples have an inherent connection to the land they inhabit (Alfredsson, 2010). Of course, Indigenous traditions are not universal, and they differ from tribe to tribe, to areas to different States, but it is also true that they do have a historical link to the land, as, more often than not, it is part of their heritage (ILO, 1987, articles 13 – 19). By damaging the environment and thus violating environmental rights, the perpetrators are also violating indigenous rights (Alfredsson, 2010). Other examples of environmental rights connected to indigenous rights are over-hunting, deforestation, water and air pollution, large scale agriculture, and many others. Because of the low ratification number of the two ILO Conventions, it is extremely difficult to prosecute those who encroach or violate the rights of Indigenous populations – especially when these rights are linked to degradation of the environment or violations of environmental rights since these are already difficult to defend as many States do not hold themselves accountable for environmental degradation or climate change. A solution that has been used in climate litigations advanced by Indigenous peoples is the *greening* of human rights, as many others have already done (Atapattu, 2019). The outcomes are not always positive, but as previously stated, this trend is contributing immensely to the development of the belief that environmental rights and human rights are intrinsically connected – and hopefully international bodies and the general populations will act accordingly.

Finally, a principle that was mentioned above takes relevance again: Article 16 of C169, which uses the formula “free, prior and informed consent”. Free, Prior, and Informed Consent (FPIC) is a right granted to Indigenous People that was encapsulated within the framework of the United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP). It is a relevant document related to Indigenous Rights and it is the outcome of a United Nations General Assembly resolution of 2007. In the preamble an affirmation can be found that is similar to the one present in the C169 preamble and in the Rio Declaration’s Principle 22: “Recognizing that respect for indigenous knowledge, cultures and traditional practices contributes to sustainable and equitable development and proper management of the environment”. Once more, the

relationship between Indigenous populations and the environment is reinforced by a legal document. The FPIC is about the cooperation in good faith between Indigenous peoples and the governments when there are decisions to be taken that involve the indigenous counterparts in a physical, cultural or legal manner.

The FPIC is essential when dealing with anything that can transfigure the land, be it from building infrastructures to exploiting resources (FAO, 2016). Concerning the matters of the environment, there are quite a few articles to take into consideration. If, yet once again, there is an acknowledgement that Indigenous peoples and the land they inhabit are intrinsically linked – from a historical, cultural and spiritual point of view – the degradation of the environment can be seen as a direct violation of their rights – be it from a human rights point of view, or indigenous rights point of view (Kennedy, 2023; Alfredsson, 2010). Article 8 of UNDRIP states that Indigenous peoples have the right not to be subjected to the destruction of their culture. Similarly, a subsequent article states that Indigenous peoples have the right to practise and revitalise their cultural traditions and customs (art. 11). Acknowledging the inseparable connection between land and heritage, environmental deterioration can be seen as cultural degradation, as it hinders Indigenous peoples’ ability to practice their traditional customs (UNEP, 2023a). Article 26 asserts that Indigenous peoples have the right to own, use, develop, and control the land and its natural resources. A statement contained in its third paragraph is rather strong compared to the one belonging to the C169, as it claims that “States shall give legal recognition and protection to these lands, territories and resources” (art. 26.3). But of course, in Article 33 paragraph 2, the declaration claims that “States shall consult and cooperate in good faith with the indigenous peoples concerned through their own representative institutions in order to obtain their free and informed consent prior to the approval of any project affecting their lands or territories and other resources, particularly in connection with the development, utilisation or exploitation of mineral, water or other resources”. If a government wants to access the resources within indigenous land, it should act by respecting the Free, Prior, and Informed Consent right. This is also enshrined in Articles 18 and 19 of the Declaration, where both asserts that Indigenous peoples have the right to participate in decision making matters that might affect them, and, since it goes both ways, States have to act in good faith and include Indigenous peoples in matters that affect them in order to “[...] obtain their free, prior and informed consent before adopting and implementing legislative or administrative measures that may affect them”. Environmental decision-making requires

public participation and access to information,¹⁸ both enshrined in human rights law, and if communities, indigenous or non-indigenous, are excluded sustainable development becomes elusive.

Unfortunately, as the Declaration on the Rights of Indigenous Peoples is not a binding document, its implementation is overly difficult. The FPIC is also difficult to implement, but its legal status and usage is strengthened by its presence in the ILO Convention No. 169 (Raftopoulos, 2019). FPIC could also be considered as a principle of environmental law, as it could be used by not only Indigenous populations but also by the wider population: in their elaboration on the topic, Raftopoulos and Short claim that the FPIC could be used alongside the precautionary principle to protect indigenous lands, and also to ensure that development projects are sustainable and responsible (p. 88).

In conclusion, environmental rights, indigenous rights and human rights are two sides of the same coin: a healthy environment is the bedrock for human well-being, and a strong and effective environmental protection application requires active respect for human rights.

3. The European Union and the Environment

The European Union is at the core a union founded on economic principles, as its original name is indeed the European Economic Community (ECC).¹⁹ For this reason, matters of the environment were not taken into consideration, nor probably even contemplated, during the drafting of the 1957 Treaty of Rome. The points that were raised in the previous sections about the development of an interest in the environment because of its transboundary characteristic can be applied in the policy and governmental context of Europe as well: after the Stockholm Conference of 1972, European Heads of State and Heads of Governments met within the body of the European Council and proclaimed that there needs to be a communitarian effort in creating environmental policies. In 1973, the Council of the European Communities promulgated a text where they asserted their resolution in introducing the matters of the environment within the bodies of the European Communities (European Council, 1973). Something that needs to be taken into consideration when talking about European policies is to always keep in mind that at the core, the EU is an economic union, as its original name suggests. This was also reminded in the document produced after the 1973 meeting, where it

¹⁸ Article 19 of the Universal Declaration of Human Rights – Article 19.2 of the International Covenant on Civil and Political Rights.

¹⁹ Of course, one could argue that the European Coal and Steel Community came first, and they would not be wrong, but the ECSC is also at its core an economic community.

underlines how the aim of the European Economic Community is to promote a “[...] harmonious development of economic activities and a continuous and balanced expansion”, which cannot happen if an external force, such as pollution, encroaches on the improvement and the quality of life (p. 5). The document itself is very thorough and covers many different aspects of environmental protection that will be included in a Community Environmental Policy (Title 1). The aims of the policy are to lower pollution levels, to maintain an ecological balance that ensures protection also from overexploiting resources, and to seek collaboration with international bodies, and to avoid duplications since the 70s and 80s were rather proficient in terms of promulgation of international environmental documents. Subsequently, several of the aforementioned environmental principles can be seen at play. The first principle that can be extrapolated from the text is the precautionary principle, on the grounds that the ECC would rather prevent environmental degradation than counteract its effects when it is already ongoing (principle 1). It is followed by the polluter pays principle, where those who pollute have to shoulder the costs of preventing and eliminating pollution (principle 5). Lastly, the principle of no-harm is enshrined in the line “[...] care should be taken to ensure that activities carried out in one state do not cause any degradation of the environment in another state” (principle 6). In conclusion, there is a stress on implementing a coordinated environmental plan, harmonising all the Member States’ national policies but at the same time an underlying economic spirit can still be seen when the document asserts that the plan should not hinder the “[...] satisfactory operation of the common market” (principle 11). The document continues, analysing the actions that should be taken to protect the environment. The first approach is to set community-wide standards on which pollutants are to be avoided or banned. It then lists the various settings where said pollutants can be found, such as in the context of energy production or industrial sectors. The subsequent chapter is about marine pollution, and it includes several international treaties on waste-dumping in the sea, treaties on pollution caused by vessels and land-based pollution that causes marine pollution (p. 23).

The second part (Title II) of the 1973 document focuses its attention on the actions to be taken to improve the environment, while always keeping in mind the economic core of the communities. For example, in the *General Guidelines for the Protection of the Environment*, the document proposes an economic venture to increase the revenue of farmers by promoting tourism in countryside areas while also promoting the area as liveable for possible future inhabitants (p. 38). The reasoning behind this is to support farmers, who play a valuable role in maintaining the environment – but at the same time, it pushes farmers into using sustainable

practices, always keeping in mind the promotion of the countryside for capitalistic ventures. By using *greener* means, it does not only promote a *natural* landscape, but also a *biological* and *ecological* agricultural practice that can then be sold for higher prices within the European Market (p. 40). It then follows that using harmful practices, such as the overuse of pesticides, harms not only the man but also animals such as migratory birds, whose protection is essential as their demise might cause a negative shift on the ecological balance of European wildlife (p. 41). Overexploitation of resources is also contemplated in the document, especially those who are scarce or that do not regenerate – always keeping an eye on demands of the market and price increases. Therefore, it suggests that studies on their regeneration should be encouraged, and to also study how recycling said resources would help the situation (p. 42). Lastly, the document focuses its attention on the issue of urban development and sustainable development. No country is an isolated island, and national policies such as overdevelopment can cause an imbalance between urban and rural-green areas, aggravating pollution and decreasing the quality of life, influencing neighbouring countries as well (Mohite, 2022). It then proposes to improve the awareness of sustainability by creating a sharing of knowledge between the European Communities, but also inside the Member States, promoting environmental knowledge within the education system (p. 46). Again, this document is very thorough and it proposes solutions and timelines to find ways to prevent a deterioration, or to ameliorate the current situation by encouraging actions on a communitarian level, and also on a horizontal level, between Member States and conjointly with international organisations such as the Organization for Economic Co-operation and Development (OECD), United Nations Environmental Programme (UNEP), United Nations Educational, Scientific and Cultural Organisation (UNESCO) and the Council of Europe (p. 49).

An evolution of the relevance of the environment on a European level developed in 1973 with the creation of an Environmental Unit within the context of Directorate Generals of the European Commission, followed by the establishment of an actual Directorate General for the Environment in 1981. By then the only way to implement anything related to the environment was through policies as there was still no change within the Treaties. Another change arose with the implementation of the *Single European Act* (SEA) of 1987. The aim of the document was to promote institutional reforms and to improve the cooperation between markets to create a *single*, synergy-based one. The environment is discussed several times over in the document by implementing provisions aimed at encouraging care for the environment (art. 18; art. 21). The innovation is the creation of a legal basis for common environmental policies, enshrined

in the *Title VII - Environment*, which would be added in the European Economic Community Treaty (Sub-Section VI – Environment, art. 25, p. 11). The aim is to preserve and protect the environment, protect human health and to promote a rationalised use of resources through the application of the precautionary principle and the polluter pays principle. It then underlines one of the most relevant principles of the European Union, that is the *Subsidiary Principle*: “The Community shall take action relating to the environment to the extent to which the objectives referred to in paragraph 1 can be attained better at Community level than at the level of the individual Member States” (art. 130r, para. 4).

The SEA is followed by the 1993 Treaty of Maastricht, which consolidated the environment as an official policy area of the Union in its Article 3.²⁰ It is then followed by the 1999 Treaty of Amsterdam, which updated the Treaty of Maastricht, and added several provisions on the matters related to the environment: it asserts that environmental protection must be implemented within Community policies, and that sustainable development must be promoted as well (art. 3). Last, but not least, there is the Treaty of Lisbon of 2007. It is considered to be one of the most important and substantial amendments of the founding treaties of the European Union, and most importantly it defines the powers of the Union: now there is a clear distinction between exclusive competences, shared competences and supporting competences (TFEU, art. 2 – 6). The environment, pursuant to Article 2C of the Treaty, belongs now to the category of shared competences: it means that Member States can legislate and adopt binding acts on the matters of the environment, unless the European Union has done so already. A novelty within the various documents of the European Union is the introduction of the concept of climate change, in particular it asserts that it is needed to promote measures to fight climate change (art. 191). Within the body of the document, the concept of sustainable development is mentioned as well, as it is now seen as policy-matter (art. 11).

Considering the evolution that the European Union has gone through, the protection and the improvement of the environment finally has a solid legal basis. Taking into account the two main legal documents, the Treaty on the Functioning of the European Union (TFEU) and the Treaty on the European Union (TEU), there are several provisions that can be extrapolated. In the beginning of this analysis, the economic core of the European Union was mentioned, and to integrate ‘*outside*’ issues within the body of the legal framework there needs to be a link

²⁰ “For the purposes set out in Article 2, the activities of the Community shall include, as provided in this Treaty and in accordance with the timetable set out therein: [...] (k) a policy in the sphere of the environment”.

between said outlier and the economy. Thus, comes sustainability into play: to integrate the environment better within the context of the European Union, one simply needs to reconcile it with economic development. Sustainable development is currently enshrined in Article 3.3 TEU and Article 21.2 paragraph (d), (e) and (f) TEU, and Article 11 TFEU. It is also important to point out that the environment and sustainable development are present within the Charter of Fundamental Rights of the European Union, in Article 37. All the aforementioned articles are worded very similarly: there is an appeal to a high level of protection of the environment, and to harmonise this action with the principles of development, in this case a sustainable one. Article 3.3 TEU also highlights the connection between the market and sustainable development by placing them on the same level.

Title XX of TFEU defines the objectives regarding environmental policy: preserving, protecting and improving the quality of the environment; protecting human health; prudent and rational utilisation of natural resources; promoting measures at international level to deal with regional or worldwide environmental problems, and in particular combating climate change (art. 191). The provisions are general and extensive at the same time, and a large margin of leeway is given to the European Parliament and to the Council to decide which action to take. This was also commented on in the judgement of the *Peralta* Case, where the Court of Justice gave an interpretation to several European provisions. The Court declares that “[...] Article 130r is confined to defining the general objectives of the Community in the matter of the environment. Responsibility for deciding what action is to be taken is conferred on the Council by Article 130s” (para. 57). Once more, the scope of the provisions is rather broad, and the European Union can act in many fields that can be traced back all the way back to the programme of action on the environment that was written after the 1973 meeting of the European Communities.

The European Union has been at the forefront of fighting and preventing environmental degradation for decades, since 1973, and with its policies and directives it can push the Member States to do more. At the same time, as of 2024, we live in a rather insecure age with instability running rampant within the European borders and beyond (ISPI, 2024). For starters, within European borders there is political instability, with far-right parties taking the reins of several governments and leading campaigns against several *imaginary enemies*, such as migrants, ethnic and religious minorities, the LGBTQ+ community and the European Union itself (ILGA, 2024). Most of the time, with political instability also comes economic instability, fuelling

animosity and alienation between the population while governments try to point to one of the previously mentioned groups as scapegoats (Karnane & Quinn, 2019). Outside of the European Union similar situations of political instability caused by warfare and aggression can be found, such as the cases of the invasion in Ukraine perpetrated by the Russian Federation or the tensions caused by the dissolution of Nagorno-Karabakh, or the current situation in the SWANA area (ISPI, 2024). All these situations can lead to political and economic instability within the borders of Europe, considering also how there are economic interests present in these countries which can lead to a considerable increase in prices and a shift in the markets (Cardinale, 2024).

A last point that to be raised is connected to the latter statement: the European Union, as a whole, is not self-sufficient in terms of resource extraction and energy production. Because of this, throughout the years, the European Union and its Member States have signed accords with extra-EU countries to buy resources. This is the case of gas supply, as there are several natural gas pipelines that supply Europe coming from extra-EU countries (European Council, 2024). Many of the suppliers are countries that are not stable, politically or economically wise. For example, there is the renowned Nord Stream project which supplies Europe with natural gas coming from the Russian Federation. The project itself was contested by external forces,²¹ and furthermore, the complicated situation with the Russian Federation has made the supply intermittent until it was officially stopped in August 2022. Because of this, several Heads of States and Governments have travelled to North Africa to ensure more secure deals now that the Russian supply has stopped (Raji, 2022). The local African situation is fickle as well, as internal fighting, political and economic instability is prominent in Algeria, Tunisia and especially in Libya and Nigeria. There is another frontier, that of West Asia with the Southern Gas Corridor – although it is unstable as well (Corbeau, 2024). Something that these regions have in common, aside from a general issue of instability, is that there is a very clear presence of social issues that will sooner or later implode and transform into a worsening of the already prominent political and economic instability.²² This causes a chain reaction that reaches Europe through an intermittent supply of resources, increasing prices, and it could even happen that a stop from the suppliers takes place because of change in governments. The current situation of resource extraction is not too dissimilar from the gas issue. For this reason, the European Union

²¹ The American Administration imposed sanctions on energy agencies that participated in the Nord Stream 2 project, and Biden himself has declared that they will do everything in their powers to disrupt it.

²² For example, the main natural gas supplier from West Asia is Azerbaijan, perpetrator of ethnic cleansing of Armenians in Nagorno-Karabakh.

is doing everything possible to either become self-sufficient or to promote renewable energy and the recycling of available materials while renouncing fossil fuels and other pollutants. As pointed out, since it is not self-sufficient, the EU has to reach agreements with extra-European countries that are more often than not unstable on a certain level (Klare, 2014; Charveriat, 2022). Europe is not a small continent by any means, and its demand might exceed the supply available in foreign markets, causing further instability abroad and inside European borders. That is the price to pay for the European Green Deal, that will be analysed in the next sections and chapters.

3.1 The European Environmental Protection initiatives and the European Green Deal

As anticipated in the previous section, the background of the European Green Deal is definitely not all roses. The European Union has acknowledged that climate change can bring instability to societies, and it needs to prevent a degradation of the current situation. To do this, there needs to be a fundamental change in the productive industry,²³ arguably one of the most polluting industries, which involves many different but essential sectors, such as the aforementioned energy sector and the extractive sector. In December 2019, the European Commission presented the roadmap to the *European Green Deal*, declaring that it aims to “transform the EU into a fair and prosperous society, with a modern, resource-efficient and competitive economy where there are no net emissions of greenhouse gases in 2050 and where economic growth is decoupled from resource use” (COM/2019/640, p. 2). The roadmap itself is extensive and comprehensive, covering a wide range of sectors, even ‘unusual’ ones such as diplomacy or finance. In short, the Commission aims at introducing policies to enforce and implement the Green Deal on a communitarian level and also on a national level. In line with environmental principles, their intent is to prevent degradation and to make those who pollute pay. This will be done by implementing targets that have to be respected, such as not exceeding a certain amount of emissions, deforestation, overfishing, over extracting, and so on, but also by strengthening the current Emission Trading System (ETS) by complementing it with a ‘carbon border adjustment mechanism’. The Emission Trading System was introduced in in 2005, making the European Union the most prominent carbon-market and it works similarly to a normal trade system: each installation that joined the ETS is allowed to produce a certain amount of pollution – if they emit less than their limit they can trade the remaining emission

²³ Productive in its more literal sense: everything that can be produced is included in this term; vehicles, technologies, infrastructures, food, clothes, medicines, weapons – everything that needs a considerable amount of energy and resources to be produced.

quota to another installation that was not able to remain within said limits, and by doing so they can obtain a revenue (p. 5). The European Union proposed to enlarge this system to other sectors such as land use or forestry and by supporting it with the creation of a carbon border, to prevent leakages of carbon outside of the European borders, but also to prevent leakages from outside to enter European borders (p. 5). The way to achieve this is to impose a tax on imports reflecting their carbon emissions: the more they emit, the higher the tax will be (Regulation 2023/956).

All in all, the roadmap provides a clear goal, that is, preventing degradation while keeping the economy afloat. As previously mentioned, Europe does not possess enough resources to fully sustain the implementation of the Green Deals and the transition to a greener economy. There is a strong insistence on recycling, reusing, on promoting a circular economy and on ensuring a wide use of clean energy. Furthermore, to do so, Europe has to upgrade all of its systems to a more sustainable and advanced technology – but again, it needs raw materials. An emblematic paragraph states that the “[...] access to resources is also a strategic security question for Europe’s ambition to deliver the Green Deal. Ensuring the supply of sustainable raw materials, in particular of critical raw materials necessary for clean technologies, digital, space and defence applications, by diversifying supply from both primary and secondary sources, is therefore one of the pre-requisites to make this transition happen” (European Commission, 2023, p. 8). Again, there is the link between energy and security, which will also be mentioned in many other documents produced in recent years, such as the Cohesion Policy ones (European Commission 2024). Later, the roadmap goes over the importance of the protection of biodiversity and, interestingly, there is a shift in vocabulary compared to the previous environmental-related documents. This will be later addressed at the end of this chapter, but this change of vocabulary allows concepts akin to the rights of nature to be further developed within the European context.

Finally, within the roadmap there is an important paragraph: the introduction of a proposal for legislation, the *European Climate Law*. This was actualised in 2021, with the Regulation 2021/1119 of the European Parliament and of the Council, on ‘*establishing the framework for achieving climate neutrality*’. Within the context of the European Union, a Regulation is a binding act, and by making it so, it forces the Member States to adhere to the targets and limits that are set in terms of pollution emissions or similar events. The achievement of the goal set in the regulation should be reached between the years 2030 and 2050, and by then Member

States must have reached climate neutrality and must lower emissions levels by 55% compared to the levels of 1990.²⁴ The document also sets a goal to achieve negative emissions after the year 2050. The regulation then refers to international agreements and recommendations, such as the Paris Agreement and the scientific data shared in the reports of the Intergovernmental Panel on Climate Change, which will be considered by an *ad hoc* board, the *European Scientific Advisory Board on Climate Change*. Said board will provide Member States and the European Union with scientific advice based on the aforementioned reports.

In line with Climate Law, and therefore the European Green Deal, are a plethora of agreements, recommendations, and guidelines set by the European Union. Furthermore, being a European policy/document, all Member States have to adhere to these texts – fully, or at least partially, which brings a better harmonisation on sustainability and environmental protection matters. This situation, compared to international agreements, is substantially better, as States cannot be forced to ratify an international treaty or to adhere to it against their will, even if said texts are the optimal choice for the environment. Case in point, even if its application is about a different topic, is the ILO169: it is one of the most comprehensive documents on Indigenous Rights, but it was ratified by a meagre number of States. Being applicable in every European Member State, this set of green policies are applicable in the Northernmost parts of the Union: the European Arctic, the main topic of this research.

4. The Arctic in a changing climate: international and regional instruments

The Arctic is the northernmost region of the Earth, and it comprises 8 States: Norway, Sweden, Finland, Denmark (Faroe Islands and Greenland), the Russian Federation, Canada, the United States of America, Iceland and, of course, while it is not a State, the Arctic Ocean has its own standing. This area has always been an object of interest for many reasons. For several decades, if not centuries, it was considered to be, to some degree, *terra nullius*, something to be explored and conquered by the white man. Significant is the number of expeditions that were led in the Arctic, such as the renowned Franklin Expedition of 1845 but also, more recently, the Arktika Expedition of 2020 led by the Russian Federation and its scientists.²⁵

²⁴ Also called the 'Fit for 55' package.

²⁵ Arktika is a nuclear-powered icebreaker ship, named after the first Arktika, one of the most powerful icebreakers ever built. <https://thebarentsobserver.com/en/arctic/2018/04/first-icebreaker-reach-north-pole-ends-its-days-scrappyard>

In the past, and especially during the colonial era, when a territory was considered *terra nullius*, in all likelihood meant that it was already inhabited by autochthonous populations that were seen as lesser in the eyes of colonial powers (Assembly of the First Nations, 2018). Therefore, the territories were ‘free to grab’, so to say. It was crucial and of the utmost importance for many Arctic States, especially during nation-building processes, to be able to have full sovereignty and control over their lands (Lantto, 2010). In this period of time, many of them used a colonial rhetoric where they claimed that being *Nordic* was essential to their national identity. This is exemplified by many national politics that aimed at conquering the north and its inhabitants, most of which were and still are indigenous populations (Minde, 2003).

The concept of a Nordic State is still very much present in today’s politics. If in the past it had a negative connotation linked to colonialism and nationalism, in the present-day it could be considered synonymous with international and regional cooperation. Despite its apparent calmness, caused by the harsh temperatures and sparse population, the Arctic is actually a very dynamic area. During the Cold War, it was the object of tensions between the USSR and the USA, and it was thanks to Gorbachev’s speech about the Arctic in 1987 that the region tentatively entered the aforementioned era of cooperation. The *Murmansk Initiative*, a foreign policy of the Russian Federation, aimed at normalising the relationships between Arctic countries by promoting demilitarisation. It also aimed at enhancing cooperation between States in the fields of resource extraction, scientific exploration, environmental protection and last but not least, addressing the issues of the Indigenous populations that inhabited the High North. This initiative was well received by the Arctic States, and it kick-started a series of bilateral and multilateral agreements on a wide range of matters. It is noteworthy to highlight that many, if not all, of the aims of the initiative were related, in one way or another, to the environment. In light of this, during his speech in 1987, Gorbachev says that the need for Arctic cooperation is imperative, especially in the matter of the environment. “It would be well to extend joint measures for protecting the marine environment of the Baltic [...] to the entire oceanic and sea surface of the globe's North. The Soviet Union proposes drawing up jointly an integrated comprehensive plan for protecting the natural environment of the North. The North European countries could set an example to others by reaching an agreement on establishing a system to monitor the state of the natural environment and radiation safety in the region. We must hurry to protect the nature of the tundra, forest tundra, and the northern forest areas”.

Gorbachev's speech created an impetus: Finland decided to take the first step and to give priority to Arctic cooperation in its governmental agenda, and by inviting the heads of states of Arctic States it started the so-called *Rovaniemi Process* in 1989. The intent of these meetings was to find ways to promote cooperation between Arctic States in the field of environmental protection. The latter was becoming a more and more relevant topic within international conferences, as the previous sections have shown. The process resulted in the creation of the *Arctic Environmental Protection Strategy* (AEPS) in 1991, whose objective was to curtail pollution, especially "[...] oil, acidification, persistent organic pollutants, radioactivity, noise pollution and heavy metals" (Heikkilä, 2019), and to promote scientific cooperation to study and analyse how it would affect the regional environment. To support this endeavour, four working groups were created: the *Arctic Monitoring and Assessment Programme* (AMAP), the *Conservation of Arctic Flora and Fauna* (CAFF), the *Emergency Prevention Preparedness Response* (EPPR), and the *Protection of the Arctic Marine Environment* (PAME).

All four of them are still relevant today, but they are part of a wider project: the Arctic Council. It was established in 1996, in Ottawa, as a high-level intergovernmental forum for Arctic cooperation. Its members are the eight Arctic States, and quite a number of observers: thirteen non-Arctic States, thirteen intergovernmental and interparliamentary organisations, twelve NGOs and six Arctic Indigenous permanent participants organisations.²⁶ The latter is rather interesting: for the first time, in 1996, there is an international and intergovernmental organisation where Indigenous people are actively involved. The preamble of the Arctic Council declaration of establishment is quite straightforward: the representatives of the Arctic States affirm their commitment to the well-being of the inhabitants of the Arctic and that of the environment, recognising the importance of the special relationship between indigenous populations and the Arctic itself. They affirm their commitment to the development of the region, whether it is environmental, economic, or social, and they also affirm their commitment to the protection of the environment, "including the health of Arctic ecosystems, maintenance of biodiversity in the Arctic region and conservation and sustainable use of natural resources" (Arctic Council, 1996). Lastly, it reiterates these concepts by declaring that the Arctic Council was established to provide "a means for promoting cooperation, coordination, and interaction among the Arctic States, with the involvement of indigenous communities and other Arctic inhabitants on common Arctic Issues, in particular issues of sustainable development and

²⁶ List of Arctic Council Observers on the Arctic Council website: <https://arctic-council.org/about/observers/>

environmental protection in the Arctic”. Interestingly, there is a footnote in the declaration that explicitly says that it will not deal with military-related matters. It could be a reminiscence of what was said by Gorbachev — and, hopefully, a way for Arctic States to put a wedge between the Cold War and a new era of stability in the region. Since the Arctic Council is a forum, it cannot produce legally binding agreements, but it coordinates and produces environmental and social assessments that can be used to contribute to the creation of legally binding agreements between the Arctic States.²⁷ In the last decades, it has assisted in the development of three binding agreements: the *Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic* of 2011; the *Agreement on Cooperation on Marine Oil Pollution Preparedness and Response in the Arctic* of 2013; and the *Agreement on Enhancing International Arctic Scientific Cooperation* of 2017. One more instrument shared between all the Arctic States is the *Arctic Economic Council* (AEC). To promote sustainable development and cooperation between States, Indigenous peoples and businesses that want to develop within the Arctic.

Other instruments that are relevant to the Arctic, but that are not solely focused on the region, are two United Nations agencies: the International Maritime Organisation (IMO) and the International Labour Organisation (ILO). It is not by chance that the IMO decided to focus its attention on the Arctic: in 1989 the Exxon Valdez, an oil tanker, struck a reef in Alaska and spilled its contents in the sea, creating an environmental disaster.²⁸ A harmonisation at the international level was needed for vessel regulations that crossed dangerous waters such as those of the Arctic and Antarctic (Jensen, 2007). The product of this was the adoption of the *Guidelines for Ships Operating in Arctic Ice-Covered Waters* in 2002. Subsequently, the *Guidelines for Ships Operating in Polar Waters* were adopted in 2009 and lastly, in 2017 a shipping code entered into force: the *International Code for Ships Operating in Polar Waters* (or, Polar Code). The latter is “[...] mandatory under both the International Convention for the Safety of Life at Sea (SOLAS) and the International Convention for the Prevention of Pollution from Ships (MARPOL)” (IMO, 2017).

²⁷ The capacity of the AC was discussed at length between the Arctic States, as some wanted to give it a legal personality and others wanted it to have only a consultative prerogative — mainly the USA. Coincidentally, the USA would not give it any importance for decades, with the Secretary of State attending a Ministerial meeting for the first time only in 2011. Available online at: <https://2009-2017.state.gov/r/pa/prs/ps/2011/05/163283.htm>

²⁸ The oil spill approximately killed: 250,000 seabirds; 2,800 sea otters; 300 harbour seals; 250 bald eagles; as many as 22 killer whales; billions of salmon and herring eggs. <https://darrp.noaa.gov/oil-spills/exxon-valdez>

While these instruments seem more economic in nature as they try to bring all vessels that venture into polar waters up to a specific standard, they also take into account the sensitivity of the Arctic environment. For example, the guidelines of 2002 have dedicated an entire chapter to environmental protection and damage control (IMO, 2002, ch. 16). The Polar Code details how to protect the environment, addressing potential infringements that vessels could make while at sea, such as: prohibiting oil, sewage, chemicals, food, and other residues discharges in the water; reinforcing vessels to become less prone to breakages and spills; prohibiting (Antarctic) and discouraging (Arctic) the use of heavy fuel oils.

Another document that is relevant to the Arctic and its population is the aforementioned *ILO Convention 169 on Indigenous and Tribal Peoples* of 1989, which revises the ILO Convention 107 on the same subject. Unfortunately, it was not ratified by many countries worldwide, as well as not by many of the Arctic States. Only Norway and Denmark have done so, respectively in 1990 and 1996. As previously mentioned, it is possible that many States see the ILO Convention 169 as a means to undermine State sovereignty by recognising the rights of the Indigenous peoples living within their territories.

Three other significant instruments are the *Barents Euro-Arctic Council* (BEAC), the *Nordic Council* (NC) and the *Nordic Council of Ministers* (NCM). The BEAC is a forum for intergovernmental cooperation on issues concerning sustainable development within the Barents, which encompasses the northernmost parts of Norway, Sweden, Finland, and the Russian Federation. It was established by the Commission of the European Communities and the aforementioned countries in 1993 with the *Kirkenes Declaration*. In the introduction, similarly to the Ottawa Declaration, it is highlighted how the partnership between Arctic States is “[...] now replacing the confrontation and division of the past. The Participants felt that such cooperation will contribute to international peace and security” (BEAC, 1993). The objectives are also similar in nature, but compared to the Ottawa Declaration, it draws inspiration from the principles and recommendations set out in the *Rio Declaration* and the United Nations Conference on Environment and Development of 1992. Another similarity is the mention of Indigenous populations and the promotion of projects that will improve their well-being. In the declaration, there is an entire part dedicated to the environment, recognising that the matters of the environment can easily transform into a transboundary issue and only through cooperation it is possible to handle them: “The Participants emphasised that the environmental dimension must be fully integrated into all activities in the Region, inter alia, through the establishment

by the states in the Region of common ecological criteria for the exploitation of natural resources and the prevention of pollution at source and recognised that solving the existing major transboundary environmental problems will be important in realising the potential for broader cooperation in the Region”. This is in line with the principle of no-harm of customary international law, that already had a relevance within the Arctic context.²⁹ The BEAC promotes Ministerial Meetings between the four States, and while the BEAC itself has no conferred powers, it can act as a policy-driver (again, similarly to the Arctic Council). As of 2023, the Russian Federation was suspended and has consequently chosen to withdraw from the BEAC (BEAC, 2023, Conclusions).

Similarly to the Arctic Council, the Nordic Council and the Nordic Council of Ministers are, respectively, an interparliamentary and an intergovernmental forum for cooperation between Arctic States, but in this case, only European countries are members of it: Denmark, Finland, Iceland, Norway, and Sweden. Additionally, Faroe Islands, Åland and Greenland have also joined the Nordic Council. The NC was founded in 1952 after several attempts at fostering Nordic cooperation failed.³⁰ It was conceived as an interparliamentary consultative body and was later formally acknowledged with the *Helsinki Treaty* of 1962. In the text, we find the first mention of the environment in Article 1, “The High Contracting Parties shall endeavour to maintain and develop further cooperation between the Nordic countries in the legal, cultural, social and economic fields, as well as in those of transport and communications and *environmental protection*”. Furthermore, the matters of the environment are also highlighted in the text under the “Co-operation in the Area of Environmental Protection” section: Nordic countries will work together to harmonise their environmental laws, to create a common ground for rules and recommendations on pollution, harmful chemicals, and other environmental damage. They will also work on coordinating on matters related to the “[...] allocation of nature reserves and recreational areas, and to protective initiatives and other measures for the conservation of flora and fauna” (NC, 1962, art. 32). Interestingly, there is again the presence of the concept of the transboundary distinctiveness of the environment, as in Article 30 it is explicitly mentioned how the members shall place the well-being of the other members’

²⁹ For example, between the Nordic Countries (Norway, Sweden, Denmark and Finland) there is an agreement to treat each other’s environment to the highest level of priority and importance – as if it were their own, moving together to prevent environmental issues to arise and therefore cross the borders and harm each other. This agreement is enshrined in the 1974 Nordic Environmental Protection Convention.

³⁰ Nordic countries wanted to create a defence union after WW2, to protect themselves but also to help each other rebuild their countries. They did not have the means, and the USA would supply them with both if they joined NATO. Denmark and Norway joined, leaving the other Nordic countries on their own.

environment as of the utmost importance. This is not too dissimilar to the principle of *no-harm* introduced in the first section of this thesis.

The Nordic Council of Ministers was a consequence of the NC and the Helsinki Treaty, and it was founded in 1971. As an intergovernmental forum promoting cooperation, from an organisational point of view it is composed of several ministerial councils, such as the Nordic Council of Ministers for Cooperation, NCM for Sustainable Development, NCM for Environment and Climate, NCM for Labour, and so on.³¹ To bring Nordic cooperation a step further, the NCM has offices in the Baltic countries and in Germany, and it has also focused its attention on cooperating with the Russian Federation. Compared to the Arctic Council and the Barents-Euro Arctic Council, there is no explicit mention of indigenous populations in the founding treaty. But it is relevant to highlight that the sole observatory member within the NC and NCM is the Saami Council, which will be introduced soon.

Two regional organisations that deal with the protection of the environment and with the protection of indigenous rights within the Arctic are the Inuit Circumpolar Council and the Saami Council. In North America, the Inuit Circumpolar Council (ICC) has been actively speaking out on climate change within various fora, such as the United Nations and UNEP, the Intergovernmental Panel on Climate Change (IPCC), the UN Framework Convention on Climate Change, the Conference of the Parties, and the International Maritime Organisation. It is active within the countries of North America, aiding local indigenous populations with legal battles and settlements related to indigenous rights, which most of the time includes environmental rights. Within the European Union we have a similar presence, that of the Saami Council. It was founded as an NGO in 1956 to foster cooperation between the Sámi people in northern Europe and Russia and to promote their rights within the governmental bodies of Norway, Sweden, Finland and the Russian Federation. The Saami Council is a forum that can be seen as a policy-driver, to “consolidate the feeling of affinity among the Saami people, to attain recognition for the Saami as a nation and to maintain the cultural, political, economic and social rights of the Saami in the legislation of the four states” (Saami Council Website, n.d.). The Saami Council is composed of several Sámi organisations, and also representatives of the various Sámi Parliaments. The latter are national institutions within the countries of

³¹ NCM for: Cooperation; Labour; Sustainable Growth; Fisheries, Aquaculture, Agriculture, Food and Forestry; Gender Equality; Culture; Legislative Affairs; Environment and Climate; Health and Social Affairs; Finance; Education and Research; Digitalisation

Norway, Sweden, and Finland that represent the Sámi population through national elections and therefore representation within the parliamentary chambers of said countries.

The Arctic has several instruments to promote intergovernmental cooperation within the region. These instruments, if not most of them, have as their main objective the protection of the environment. It is not surprising, since the Arctic is intrinsically linked to climate change: the effect of climate deterioration can be seen in the Arctic, with melted ice, the acidification of rain, and higher temperatures. At the same time, the worsening of the climate in the Arctic can be felt all around the world, with the most prominent example being the increasing sea levels (Hancock, n.d.). All the Arctic States have been coordinating between themselves with the support of the international and regional instruments to mitigate and overcome the worsening situation of the climate.³²

4.1 The EU and the European Arctic

The Arctic is considered to be a periphery within the context of the European Union, geographically speaking, and politically speaking as well. That is not to say that the European Union does not care about the Arctic, but rather the interest was sparked only in recent years because of only two, but significant, issues: climate change and geopolitical issues. The latter is more prominent whenever one reads documents produced by the European Union on the Arctic, but it is always followed by concerns about the environment – on their own or related to geopolitical issues. Of course, as shown previously, regional cooperation is the backbone of the Arctic and all its instruments, but geopolitics and the environment are the main topics of discussion (Raspotnik, 2018).

A brief historical excursion will precede an examination of the European Union's contemporary Arctic vision and the relevance of its policy frameworks. The first major step towards Arctic Cooperation within the European context happens thanks to Finland's proactivity, seeing that after kick-starting the Rovaniemi Process, it also initiated the process for the creation of the so-called *Northern Dimension* within the body of the European Council in 1997 (European Council, 1997, para. 68). This was due to the fact that the European Union had welcomed several new member states, including Arctic ones, like Denmark in 1973 and Finland and

³² With the exception of the Russian Federation, who has been either suspended or has stopped participating in meetings within international Arctic organisations since the military invasion in Ukraine of 2022. It still cooperates in international settings, but less than before.

Sweden in 1995. Finland's plea was to incorporate a Northern Dimension to the current and future European policies, seeing that the enlargement added thousands of kilometres of borders within the Arctic Circle and with the Russian Federation as well. Reminiscing what Gorbachev said, cooperation in the Arctic was needed more than ever – hence the creation of the Northern Dimension, which includes all the member states of the European Union, Norway, Iceland and the Russian Federation. In the year 2000 an Action Plan was outlined, which included, like most Arctic instruments created at the time, a focus on the care of environmental and nuclear safety (European Commission, 2000, 9401/00). The Action Plan was updated in 2007, and it now acts as the common framework for cooperation in the matters of the economy, freedom, security, justice, external security, research, education, and culture (European Parliament, 2006). Alongside the more institutional part of the Nordic Dimension are the partnerships, which include the participation of States that are granted observer status: the United States, Canada, and Belarus. Said partnerships include, but are not limited to, The Northern Dimension Environmental Partnership and The Northern Dimension Partnership on Transport and Logistics. Both are self-explanatory, as the first deals with environmental protection, sustainability and waste management – and the latter deals with transportations, land and maritime, public and commercial. As of 2022, the Northern Dimension has suspended all activities that concern the Russian Federation and Belarus (EEAS, 2022).

From the conception of the Northern Dimension forward, the matters of the European Arctic dealt mainly with the matters of the environment and security. In 2008, one of the first documents produced by an institutional body of the European Union was the *European Parliament resolution of 9 October 2008 on Arctic governance*. It is a thorough document that considers the urgency to act immediately to curb any issues related to the environment and security, seeing that the Arctic is not a subject of any international treaties, and cooperation in various fields might be more difficult to attain. In the document there is an equal share of urgency between the environment and security, with the first needing protection because of climate change and a worsening of the environmental conditions caused by man-made influences, such as resource extraction and maritime traffic. The latter two are also a concern related to security: increased maritime traffic, of commercial or military nature, due to the melting of the sea ice and accessibility to trading routes can worsen environmental conditions, and the possible presence of “approximately 20% of the world's undiscovered oil and gas reserves” (para. h) interests and alarms the European Parliament to a point that it recommends the Commission to include Arctic energy security and energy policies in their future

communications – lest it leads to security threats (para. h, 8, 11, 13). Interestingly, the document also takes into consideration the effect of climate change and security issues related to the indigenous populations that inhabit the Arctic and its indigenous flora and fauna.

This European Parliament resolution is followed by the aforementioned Commission communication on *The European Union and the Arctic Region* (COM/2008/763). The document reiterates what was said by the European Parliament, but it goes more in depth, proposing policies and the actions to achieve their goals. Inevitably, the document itself begins with a stress on acting to prevent the worsening of the environmental degradation that the Arctic was going through at the time. Taking note of the transboundary characteristics of the environment, the European Union should strive to improve climate change mitigation policies on a communitarian and global level. There is an acknowledgement that pollution from anywhere inside, and outside, of the Union can worsen the situation in the Arctic, and there is an urging the Member States and other European institutions to strengthen the efforts to mitigate climate change, or to adapt in case of unavoidable situations. It then goes on to assert a more proactive approach within the Arctic, dialoguing with Member States and NGOs, but also with the aforementioned Arctic instruments such as the Barents Euro-Arctic Council, the Northern Council of Ministers and the Arctic Council. It continues by highlighting the need to develop sustainable projects, especially in resource extractions, and to promote cooperation between the European Union, Arctic Member States and other partners in the research, extraction, and monitoring of offshore resources. Related to this topic is that of transportations and fisheries: in the first case, as previously mentioned, the melting of the sea ice could open up to new trading routes which could “[...] save energy, reduce emissions, promote trade and diminish pressure on the main trans-continental navigation channels” (European Commission, 2008, p. 8). Of course, this new opportunity had to be closely monitored as accidents at sea can easily happen, but fortunately all European Member States are signatories of several International Maritime Organization treaties that deal with sea safety standards. Related to this topic is that of fisheries: the European Union is one of the most important consumers of Arctic fishes, and it is in their interest to protect the environment from overfishing, from pollution and of course to regulate trade and markets that involve ichthyic products. It is not surprising that a little over a decade later, the European Union became an important actor in the realisation of the *Agreement to prevent Unregulated High Seas Fisheries in the central Arctic Ocean* (European Commission, 2021c). Last, but not least, the 2008 document is revolutionising in and of itself because it explicitly mentions Indigenous populations, not on generalist terms like

in the previous resolution, but that of Europe: the Sámi. It takes into account their precarious situation, but also their knowledge which is intrinsically connected to the Arctic environment. Their right to maintain their traditional livelihood is recognised, and it is also recognised how modern activities can hinder the enjoyment of their rights. For example, it tries to tackle the intertwining issues of animal welfare and traditional activities, such as whale and seal hunting and trading by proposing an exemption for indigenous communities.

Needless to say, from 2008 onwards most, if not all, documents related to the Arctic will deal with mitigation of environmental degradation, sustainable development and security, from an energetic point of view or from a military one. This is encapsulated within the most recent document, the 2021 joint communication written by the High Representative of the Union for Foreign Affairs and Security Policy calling for *A stronger EU engagement for a peaceful, sustainable and prosperous Arctic*. The document recalls what has been said in the course of the years, combining the new perspectives of the European Union for the environment and for the future of the Union itself. It brings forward the importance of the European Green Deal and Climate Law, claiming that they will be at the heart of any EU activity in the Arctic (p. 1). Furthermore, it highlights the geopolitical issues that are intrinsically linked to the Arctic, climate change and sustainable development – it is a snake that bites its tail. The worsening of the environment will give more opportunities to travel the high seas, improving commerce and trade, which will contribute to the deterioration of the environment all over again. It is a short-term gain for sure, if one takes into account the long-term negative consequences that this would have. At the same time, the melting of the permafrost will unearth gases and materials that can be extracted and exploited, but it will undoubtedly worsen, again, the environmental conditions. Similarly to the 2008 document, the European Union has put forward a series of objectives and policy proposals to coordinate Arctic actions, to keep the region safe and stable (p. 2). This following section will highlight the targets that the European Union has to meet regarding climate change mitigation and the Arctic. First of all, the European Union “recognises and will continue to assess its own impact on the region” (p.7). This self-awareness brings more concrete attention to the climate neutral goals that are set in the *Climate Law* framework, such as the Fit for 55 and the 30*30 goal, which is meant to protect 30% of land and 30% of oceans by the year 2030. On average (EEA, 2023), Nordic countries do not pollute as much as other European Member States, and the low population density within the Arctic Circle could also be seen as a positive outlook for the implementation of measures to reach the two aforementioned emissions and pollution goals. Of course, climate change is a

transboundary issue, and coupled with the complexity that is the protection of the oceans, it will still pose a challenge. The European Union then also acknowledges that it is responsible for 31% of CO₂ and 16.5% of black carbon emissions within the Arctic due to maritime traffic (p.9). Its solution is to advance sustainable transportations, to reach the target of zero emissions, and zero pollution caused by shipping, in line with the European Green Deal and the Fit for 55 goal. Maritime traffic, of course, can cause environmental degradation by disposing waste in a wrong way, or even because of crashes and accidents of the vessels: to curb this, the European Union has decided to fully align with the recommendations and frameworks of the International Maritime Organisation, which has produced several documents in the past that regulates traffic in the Arctic. The seas in the Arctic are an area of tensions for several reasons: first of all, as mentioned, maritime traffic generates pollution and vessels often venture inside Exclusive Economic Zones that do not belong to them; secondly, said EEZ are bountiful of resources, fishes and fuels alike, and the Arctic has seen many diplomatic exchanges about this.³³ Resources are another aspect that is very important to the European Union, and consequently the Arctic.

In conclusion, the European Arctic is brimming with several regional instruments whose goal is to protect the environment, that work hand-in-hand with national authorities and the European Union itself.

5. Conclusion: Bridging the gap between Environmental Law and effective Climate Change mitigation

Environmental law has long served as a crucial tool for protecting the environment, and our planet. However, as the climate continues to worsen in a tangible way, with extreme weather events and high temperatures, it is not surprising that one might wonder if the plethora of functional instruments to curb climate change and to protect the environment are effective or not – and bridging the gap between existing instruments and effective mitigation strategies is

³³ There are several documents pertaining the issue of delineating coastal areas, EEZ, and rights of passages. Chronologically: 1965 Note from the Soviet MFA to the U.S. Embassy concerning the passage of the Coast Guard Northwind; 1977 Royal Decree relating to the fisheries protection zone around Svalbard; 1979 Agreement between the Kingdom of Denmark and the Government of the Kingdom of Norway concerning the delimitation of the Continental Shelf in the Area between the Faroe Islands and Norway concerning the Boundary between the Fishery Zone near the Faroe Islands and the Norwegian Economic Zone; 2010 Treaty concerning maritime delimitation and cooperation in the Barents Sea and Arctic Ocean; 2014 Russian Federation Decree n. 813 Rules of the repeatedly crossing by foreign ships of the State Border of the Russian Federation without border, customs and other forms of control; 2015 Russian MFA Comment on the Measures taken by the Kingdom of Norway to limit access to Svalbard Archipelago; between Norway and Russia. See Schönfeldt (2017).

becoming increasingly apparent. The first point to acknowledge is the fact that most current international instruments are not binding. It is in the hands of governments and States to actually follow the various recommendations that are produced by international and national environmental bodies. It is also very hard not to acknowledge the economic and strategic interests that many countries might have in keeping up the production of harmful materials, and thus, refusing (or downplaying) to adopt effective mitigation plans. A debate that is often heated is that of the effectiveness of the COP meetings (Friends of the Earth, 2023). The members of the United Nations Framework Convention on Climate Change meet every year in the so-called Conference of the Parties, COP, to discuss climate change mitigation. These meetings are crucial, as they are attended not only by NGOs and civil societies, but also by heads of States and heads of Governments. It is a very effective way to reunite everyone and discuss the threats that are upon our planet, and these meetings are proficient as well: very succinctly, the COP21, held in Paris in 2015 has produced the aforementioned Paris Agreement, to lower greenhouse gases emissions. The 2023 edition was held in the capital city of the United Arab Emirates, Dubai – a country that is ranked 9th worldwide on the production of petroleum (OEC, 2022). Of course, that is not to say that the COP is useless or ineffective: the issue that arose from the last edition was the duplicity of the event, seeing that the host country is rather adept at selling petroleum, to a point that the United Arab Emirates' export of the year 2022 amounted to 402 billion dollars, of which 162.9 billion dollars concern petroleum (OEC, 2022). That is roughly equivalent to 40.5% of the total exports. One might wonder about a conflict of interest by seeing such numbers.

The second point to be raised is the following: bridging the gap between the two requires a multi-faceted approach that strengthens the already available instruments, while also fostering innovation and cooperation on a national, regional and international level. Unfortunately, environmental law, and law itself, can be limited. As showcased in the course of this first chapter, it is not easy to prosecute those who tarnish the environment when violating emission targets. An idea to fix this could be to create a wider system of carbon pricing, similarly to what the European Union has done with the ETS: by putting higher prices on carbon emissions, it disincentivizes polluters and, hopefully, would incentivize them to invest in greener solutions so they would not have to pay fines or increased taxes. At the same time, a multi-faceted approach could mean a more active citizenship participation. Again, the European Union leads as an example by having several instruments that are available and knowable to the wider audiences and by doing so, it empowers citizens to hold governments and corporations

accountable for their actions – strengthening environmental action and democratic participation. This is seen in the rising number of legal cases and lawsuits against either government or corporations by citizens all over the world.³⁴

Bridging the gap can also mean adapting and improving by fostering cooperation between different parties. As stated several times in this research, cooperation between States is of the utmost importance: environmental law needs to be harmonised across borders to avoid a worsening of the situation, and by implementing effective and comprehensive instruments, much can be done to safeguard the environment. Another point related to this is that of Indigenous rights, and we have seen how the environment is intrinsically linked with them. There are many indigenous communities worldwide that have tended the earth for centuries, and sometimes, they know more than anyone else (Earth.org, 2022). Their relationship with the environment is nothing to be trifled with, and this knowledge could be an asset to deal with climate change mitigation in certain areas. It is not surprising that more and more indigenous groups are called to collaborate with local governments to improve the current situation and prevent further environmental degradation. As a fitting conclusion to this chapter, the next and last topic to be introduced are the Rights of Nature. To bridge the gap, sometimes a more holistic approach to rights is needed – to protect the environment for the sake of protecting it, and not to ration the resources needed for humans and markets to survive.

5.1 Shortcomings and emerging limits: anthropocentrism and non-human rights

Environmental law and all of the instruments that have been showcased in this chapter have undoubtedly played a vital role in protecting the environment and our planet. However, associated with the aforementioned (in)effective climate change mitigation, there is also the issue of a comprehensive and effective environmental protection. One key shortcoming of environmental law and climate change mitigation is the inherent anthropocentric basis that is at their foundation. Law, in and of itself, has always prioritised the protection of men for their own benefit, and environmental law is not an outlier: the environment has to be protected and has to be healthy so that humans can enjoy it, and similarly, sustainable development revolves around the improvement of human life rather than the improvement of the environment itself. Even the construction of *green* infrastructure, of *green* transportations, of *green* cities, are built keeping in mind the well-being of humans rather than the health of the environment and its

³⁴ There are several cases, but the most recent ones are the “Duarte Agostinho and Others v. Portugal and 32 Others” case and the “Carême v. France” case.

inhabitants. This does not mean that the latter two do not benefit from the green agenda, but their needs are not the ones that are put on top of the priority list. Most *green* approaches fail to take into consideration interests other than human ones, and fail to recognise the intrinsic value of nature – which is independent of its utility to human societies. Rights of Nature are, as the name suggests, rights that aim at defending nature and they go hand in hand with the concept of *ecocentrism* or *deep ecology*. Both argue that nature, and all the dwellers that inhabit its ecosystems, have an inherent worth that is not related to its use to us humans or our well-being, and have fundamental rights, including the right to exist and to flourish (Ruales, 2024, p.3). For western jurisprudence and philosophy, this concept is rather new and not very developed, while, on the other hand, this way of thinking is inherent to many Indigenous groups all over the world.

From a legal point of view, codifying Rights of Nature is not easy and sometimes it is downright impossible. While there is a rising interest in ecocentrism in the western world, especially in younger generations, courts and legislators fall behind compared to their counterparts in *southern* parts of the world. The main idea behind this development is of rhetorical nature: if corporations, toddlers, and States have the right to be protected and represented in courts by lawyers, who's to say that trees, rivers, and mountains cannot do the same? Two exemplary events are the adoption of a new constitution in Ecuador, in 2008, and the granting of legal rights to ecosystems after the implementation of the Te Urewera Act in Aotearoa, in 2014. In the first case, the Ecuadorian constitution claims that nature has a right “[...] to integral respect for its existence and for the maintenance and regeneration of its life cycles, structure, functions and evolutionary processes” (art. 71). It is an interesting first case, because the constitution does not grant general rights to nature, but it grants them specific rights: respect, regeneration, and restoration. In Aotearoa, the Indigenous groups and the Government have worked hand in hand to restore and to protect the land, and the Te Urewera Act is the first of many steps taken in this direction. The Act itself granted legal personhood to a forest as it is “[...] a place of spiritual value and here [the Act] uses the Maori language about [Te Urewera] having its own *mana*—its own authority, having its own *mauri*—its own life force, and that Te Urewera has an identity in and of itself” (Calderwood, 2016). This legislation had several ramifications, one of which is the granting of legal personhood to another ecosystem, that of the Whanganui River (Parliament of New Zealand, 2017). When natural areas are represented in courts by lawyers, especially those that were granted rights, there is a higher chance to protect them from further degradation or encroachment – making environmental protection even more effective than

when it is protected by other available international instruments. Many countries have tried to emulate these procedures, successful and unsuccessfully. In the first instance we have the granting of legal rights to the Mar Menor, a lagoon located in the South-East of Spain. Before this event, the lagoon, being classified as a wetland, was protected by the 1971 Convention on Wetlands but unfortunately it was not enough and the extreme pollution in these waters threatened to completely collapse its ecosystem, to a point of no return. In October 2022 the Spanish Government granted the lagoon the right to exist, allowing it to be legally represented by lawyers and citizens alike (Ley 19/2022). It is the first case of ecosystems being granted rights in Europe, and hopefully more will come. In the second case, it is emblematic of the Lake Erie Case, where citizens of the city of Toledo, United States of America, voted to grant rights to the lake, which has been the object of continuous pollution attempts by local corporations. A proposed Bill of Rights to be amended within the municipality's charter, affirmed that Lake Erie had a right "[...] to exist, flourish and naturally evolve, a right to a healthy environment for the residents of Toledo, and which elevates the rights of the community and its natural environment over powers claimed by certain corporations" (People of the City of Toledo, 2020). Unfortunately, local corporations and the State of Ohio itself joined forces to strike down the legislation, and the Federal Judge presiding over the case declared it unconstitutional, saying that the protection of Lake Erie pre-empted state law and violated the 14th amendment of the United States' constitution. In addition, the judge claimed that the municipality of Toledo had overstepped its authority but that, nevertheless, the aim of the legislation was commendable, but the Bill should have had a better legal basis (*Drewes Farms P'Ship v. City of Toledo*, 2020).

Parallel to this, is the increasing importance that is given to animal rights - also called *non-human rights*. Compared to the Rights of Nature, there are not many exemplary cases, but it is noteworthy to point out that both sets of rights go hand in hand, and the protection of one is intrinsically linked to the protection of the other. From the point of view of legislation, on average, there is a lack of protection for non-human animals. A tentative step can be seen in the European Union, with its article 13 TFEU which asserts that "[...] the Union and the Member States shall, since animals are sentient beings, pay full regard to the welfare requirements of animals, while respecting the legislative or administrative provisions and customs of the Member States relating in particular to religious rites, cultural traditions and regional heritage". The acknowledgement that animals are sentient beings and can feel in a way that is not too dissimilar from the way humans do, is a big step forward in the grand scheme of

widening the scope of rights protection to all the inhabitants of our planet. Similarly to what was written in the previous paragraph about the Rights of Nature, non-human animals and their well-being are protected to the extent that humans can enjoy them – enjoy them visually, or on their dinner plates. There are many provisions in place that protect non-human animals, especially mammals, but not many that protect insects or other *'not so cute'* beings. Animals should be protected regardless of their appearance and of their contribution to our ecosystems – this is enshrined in the many non-human animals' rights movements around the world, that assert that animals should be protected because of their inherent right to live. Again, it is not dissimilar to the founding idea of the Rights of Nature, because after all, if ecosystems are protected then also its inhabitants are protected from human encroachments.

Chapter 2. The Synchronised Advancement of the Green Agenda and Green Colonialism

1. Introduction

The aim of this chapter is to introduce and explore the intricate relationship between the environmental agenda and the resurgence – and reinforcement – of colonial practices. Environmental protection, climate change mitigation, sustainability, digital transition: all these concepts, and many more, are being instrumentalized to justify and perpetuate an unequal distribution of power relations on a global scale. By investigating several case studies, we will see how this issue is modern and has a novelty to it: it is modern, because it is happening right now, and novel as colonialism typically affected the Global South – while nowadays, these practices can also occur in the Global North (Silva, 2022).

In the previous chapter, the multitude of international organisations and treaties discussed are an indication of the urgency of dealing with environmental protection and climate change mitigation, and the presence of several cases of environmental litigation are also a hint that there is a shift and a broadening of the issue – where the citizens are taking matters into their own hands (UNEP, 2023a; 2023b). Said broadening also entails a geographical enlargement, seeing that climate change and environmental degradation affects everyone from the Global South to the Global North – and what once were peripheral territories are now at the centre of attention.³⁵ It is impossible for politicians and policymakers to ignore the issues related to climate change and environmental degradation when everyone can see the effects everywhere they look.

Climate change mitigation and environmental protection are, from a policy point of view, at the forefront of several political campaigns that are happening all over the globe and can be summarised in one very eye-catching moniker: the Green New Deals. For the sake of brevity, from henceforth, the Green New Deals that will be taken into consideration are the European Green Deal and the North American ones (United States of America and Canada), as both of them affect the Arctic, the main geographical focus of this thesis – with a stronger emphasis on the European one.

³⁵ To exemplify: issues that are ‘far away’ from the Global North used to be ignored in the past as they were, literally, quite far away and did not affect it. But nowadays, issues from peripheral territories, such as the Arctic or the Islands of the Pacific (Kiribati, Salomon, etc.) are brought to our attention and are ‘near’ the Global North – thanks to globalisation, social media, and the various environmental and political fora where their grievances can be heard loud and clear and cannot be ignored.

The Arctic, as mentioned in the previous chapter, is fundamental to maintaining our planet, and ourselves, in good health (Green Peace, 2017). Polar ices act as regulators of our climate, absorbing heat and therefore cooling down the global temperature – the thinning of the ice will negatively influence the thermoregulating effect, which will be lost (Norsk Polarinstitutt, n.d.). If there is little to no ice, heat will not be absorbed and will increase the global temperatures, producing extreme weather events across the globe. These extreme events could result in floods, extreme temperatures, and droughts, as well as a loss of ice sheets, ice caps, and glaciers will affect coastal areas worldwide, by increasing global sea levels. Needless to say, that everyone will be affected, from humans and their settlements to animals and ecosystems including the Arctic itself. Scientific research claims that Arctic ice is at peril more than its southern counterpart, and that by 2040 the Arctic will be ice-free (Hancock, n.d.). Furthermore, scientific research also points out how the Arctic may be fundamental for the formation of clouds, and the loss of its major characteristic may, once again, influence the world (Candanosa, 2021).

It is not only the scientific sphere that has a strong interest in the Arctic, but also the political sphere that has shown a similar interest. In recent years, we have seen an unprecedented interest of non-Arctic States in the Arctic. Starting from 2007, Greenland became a recurrent visiting spot for many European politicians to show that they are concerned about climate change.³⁶ The Danish autonomous territory was visited by José Manuel Barroso, the then president of the European Commission; Romano Prodi, the former Italian Prime Minister and also by Angela Merkel, the ex-Chancellor of Germany (Raspotnik, 2018). The latter was also at the time the head of the G8 and brought up the issue of GHG emissions several times during her tenure,³⁷ and it is not surprising that the Arctic and its protection, and therefore climate change mitigation, entered the agenda of several political bodies from within Europe and outside of it. A direct consequence of this political interest is the constantly growing participation in Arctic matters by non-Arctic States, which is also showcased by the presence of ‘outsiders’ within the

³⁶ Greenland was also called the ‘Mecca of Climate Tourists’ because of this growing interest back in the mid 2000s. Bomsdorf, C. (2007, August 15). Das Mekka der Klima-Touristen. Welt. <https://www.welt.de/politik/article1108106/Das-Mekka-der-Klima-Touristen.html>

³⁷ Germany’s ex-chancellor Angela Merkel has been rather vocal about cutting GHG emissions by half and promoting environmental policies during her tenure as leader of the G8. This visit to Greenland was highly criticised but it still is considered one of the starting points of a wider European political interest in the Arctic. Gathmann, F. (2007, August 17). Merkel Inspects a Changing Climate in Greenland. Spiegel International. <https://www.spiegel.de/international/germany/arctic-thaw-merkel-inspects-a-changing-climate-in-greenland-a-500486.html>

Arctic Council that have an interest in the area – that sometimes is not linked to a wish to protect the environment, but to be involved and influence Arctic matters.³⁸

This scientific and political interest culminated in the creation of the aforementioned Green New Deals, whose plans are to protect the environment and shift our societies towards a more sustainable and cleaner lifestyle by transitioning to renewable energy, cutting GHG emissions, departing from international dependencies on several unsustainable resources, and more that will be explained thoroughly in the next section. Unfortunately, to advance towards the aims and objectives of the Green New Deals, there needs to be an astounding amount of capital, both monetary and material. While money is definitely a concern for many countries, what is really needed are the materials to sustain the Green New Deals. Most of the technologies built to supply and advance the energy sector and the transportation sector, just to name the more capital-intensive ones, are built with materials that are not largely found within the borders of the European Union. And, seeing that most of the world wants to invest in sustainable energy, there is a higher demand for a limited number of materials. We will see about the limits of said materials in the next sections, but it is also relevant to take into account geopolitical and economic matters as these materials are, again, limited and are present in the soil of a small number of countries that can withhold them if they so choose. Prior to the Covid-pandemic, the demand for materials and resources to build microchips came to such a height that a global shortage occurred (Shein, 2023). Trade wars between countries influenced pricing and distribution of the raw materials needed to build microchips, and when the demand for chips needed in the car industry arose, a shortage took place again and car production slowed down (Brinley, 2023). Chips are also needed for, among many others, computers and for a vast array of technological instruments that are essential for reaching the aims of the digital transition – one of the many European Union’s goals. It is not surprising that the European Union reacted accordingly after the chip shortage: the *European Union Chips Act* entered into force on 21st September 2023. On its dedicated website it claims that there is a “need for EU action” as “chips are strategic assets for key industrial value chains” (European Commission, 2022a). It then acknowledges the global shortage issue and urges the Member States to subsequently act to create a European “chip ecosystem”, to not be as dependent on foreign suppliers and their geopolitical strategies.

³⁸ The States in question are: China, India, Italy, Japan, South Korea, Singapore joining in 2013; Switzerland joined in 2017.

A reliable supply of resources and materials is, undoubtedly, the main concern for the European Union, to reach its goals and to be as safe as possible from foreign markets influences, as well as geopolitical and economic strategies between other countries.³⁹ Predictably, during its *rassemblement* in Versailles in 2022, while denouncing the Russian Federation's invasion of Ukraine, the Heads of States of European countries agreed on reducing their strategic dependencies regarding the aforementioned microchips, materials, and resources (European Council, 2022). A contributing factor was the European Union's dependency on Russia's gas supply, which was the target of an attack and because of the Union's decision to cut off every relationship with the Russian Federation and its allies too. This culminated in the approval of the *European Critical Raw Materials Act*, which entered into force on 23rd May 2024.

Despite these two aforementioned documents, the European Union is not in the process of isolating itself or trying to become fully independent from foreign markets – it cannot become so because of a lack of resources and materials that are not present within European borders. This is where the Arctic comes in: it is a rich and unexploited territory that might bring many benefits to the European Union as a whole. This is also the case for the Arctic States that are not found within the European Union, such as Canada, the United States of America, and also the Russian Federation. The Arctic States have already used their lands and will keep exploiting their territories to advance their national interests and politics, while also opening – in a sense – their borders to external interests. The environmental degradation that occurs when extracting materials and exploiting resources is oftentimes bolstered by an imposition of policies, such as green ones, without an adequate support or consideration for the local contexts. This will undoubtedly exacerbate tensions between the periphery and the central power, but also exacerbate the relationship between, in the case of the Arctic, indigenous populations and the State. Finally, this chapter aims at exploring, through several case studies, the issue of the advancing of green policies and the exploitation of the land and resources that have been, and are, inhabited by indigenous populations.

³⁹ The U.S. has decided to create an alliance called “Chip 4”, which comprises the U.S., Taiwan, South Korea and Japan – therefore isolating China, one of the main producers of semiconductors and chips. While many applauded the U.S. for this choice, others said that China has already invested a sizable amount of capital in this field and will ‘beat’ the U.S. in this trade war by producing cheaper and more effective chips that might overwhelm the American, and its allies, markets. <https://aeneas-office.org/2023/01/06/eu-chips-act-the-debate-goes-on-geopolitics-remaining-open-for-business/>

2. Climate Change Mitigation: Green New Deals (GNDs) and their need for resources

As introduced previously, Green New Deals are political and economic plans from all over the world that are seeking to prevent a worsening of the current environmental and climate situation. The Green New Deals that are relevant to this thesis are the ones that have an impact on the Arctic, and to be more specific, the European and North American Green New Deals – which will both be analysed. The first aspect that has to be pointed out is that the European Green Deal (EGD) is more concrete and advanced in terms of policies, frameworks and goals: there is a programme, there are specific aims and specific targets to be reached, and also its implementation is more advanced as the European Union institutional structure facilitates the application processes. On the other hand, both North American States are federal entities, which can lead to a more difficult implementation process and a fragmented policy application (Konisky, 2015). Despite these differences, both have similar aims and goals, and that is the reason why we can unite them under the umbrella term of Green New Deals. And what also unites them is their need for resources to advance the greening processes.

The United States of America and Canada do not have a package of reforms, policies, and laws implemented that we can call the Green New Deal, in the same way that the European Green Deal is. It is, in a sense, surprising, that it did not take root as the term Green New Deal was coined in the United States by Thomas L. Friedman, a journalist. In 2007 he published an opinion piece in the New York Times, claiming that the word *green*, which was usually associated with somewhat negative connotations in the eyes of most Americans, should be rebranded – he predicted that it would become “[...] the basis of a new unifying political movement for the 21st century” and would have the power “to mobilise liberals and conservatives, evangelicals and atheists, big business and environmentalists around an agenda that can both pull us together and propel us forward”. By drawing inspiration from the New Deal, the industrial plan of the U.S.’ former president F. D. Roosevelt, who revitalised the economy during the Great Depression, Friedman thought that governments should invest in research and in the betterment of the countries in and of themselves – because making a country *greener* would improve, essentially, the lives of everyone from many different fronts. In a way, he also predicted that capitalists and companies would capitalise on green tech development, becoming the future of the global economy and it would dominate it for a long time as well. Lastly, he concludes that for a *greening* to happen, a radical change is needed – if the issue is

not as heard as it should have been, it is because “big transformations – women's suffrage, for instance – usually happen when a lot of aggrieved people take to the streets, the politicians react, and laws get changed. But the climate-energy debate is more muted and slow-moving. Why? Because the people who will be most harmed by the climate-energy crisis haven't been born yet. [...] In many ways, our parents rose to such a challenge in World War II – when an entire generation mobilised to preserve our way of life. That is why they were called the Greatest Generation. Our kids will only call us the Greatest Generation if we rise to our challenge and become the Greenest Generation” (Friedman, 2007).

A first comprehensive proposal for a Green New Deal in the U.S. is the so-called ‘H.R. 109’, or *Recognizing the duty of the Federal Government to create a Green New Deal*. Pushed forward by Congresswoman and left-wing activist Alexandria Ocasio-Cortez alongside Senator Edward John Markey in 2019, it had a very short life: not only was it not approved, but it did not receive a single vote. Other attempts met similar ends, until 2023, where the text proposed was once again introduced in a new resolution, H.R. 319, and finally passed the first legislative step, which means that it is now being analysed thoroughly by several sectoral Committees and Subcommittees since the topics of the resolution fall within their jurisdiction.

What does the resolution entail? First of all, the fact that it is a resolution means that it is not a binding instrument, but only gives a sense of direction to the Congress in proposing future bills. The bill highlights how the reduction of racial, gendered and regional inequalities based in economic disparity is deeply intertwined with decarbonisation of the U.S. Climate change, the resolution claims, is a direct threat to the U.S.’ national security as it functions as a threat multiplier and it impacts “the economic, environmental and social stability of countries and communities” (H.R. 319, 2023). It then continues by claiming that it would be a great economic opportunity to act, as the Green New Deal would provide to U.S. citizens by creating millions of high paying jobs, “unprecedented levels of prosperity and economic security” and by fighting against systemic injustices. The linkage between climate change and economic disparity is not a new concept, as economists have found an interconnection, where the higher the income is, the higher the CO₂ emissions per inhabitant because of disproportionate consumption practices (Jorgenson et al., 2015). At the same time, high CO₂ emissions per inhabitant have been also found in poor households: the fact that many families cannot afford to buy modern appliances that would imply a higher efficiency and lower emissions is also touched by the H.R. 319 – that is why countering inequalities by giving people high-paying

jobs will inevitably allow people to move out from obsoleted households and give up outdated technologies. Just like Friedman claimed, there needs to be a deeply radical change in the DNA of not only the people, but of the entire country-policy-machine: the U.S. government should take into account the emissions costs whenever discussing old and new bills and policies; provide education to everyone, so that they can equally participate in a *greener* change; invest in R&D for sustainable and renewable energy and technologies; make the transition just for everyone, especially marginalised communities, guaranteeing jobs, social- and healthcare; focus more on domestic production rather than trade with foreign countries – if so, enforce trade rules that would allow for a strict emissions allowances. Last, but not least, the H.R. 319 wants to ensure that public lands, waters, and oceans are protected and that “obtaining the free, prior, and informed consent of indigenous peoples for all decisions that affect indigenous peoples and their traditional territories, honouring all treaties and agreements with indigenous peoples, and protecting and enforcing the sovereignty and land rights of indigenous peoples” is of the utmost importance (Jorgenson et al., 2015). It is a proposal of a very economic nature (Galvin & Healy, 2020), as the protection of the environment in and of itself is merely considered towards the end of the text – the vast majority of the resolution is about lowering emissions, that undoubtedly will improve climate conditions and therefore affect the environment less, but it is in a sense very similar to what the New Deal once was: to make the U.S. prosperous again, while also getting some sidelines benefits.

Another important proposal for an American New Green Deal that has to be mentioned is that of Senator Bernie Sanders: it is very similar to H.R. 319, but it was not presented within any of the institutional bodies, as it is a proposal and a presidential plan, if he were elected to become President of the United States. Compared to the latter GND proposal, it is probably more radical and definitely more thorough. There is a stress on a just transition, giving Americans better paying jobs and better social- and healthcare. Climate change should be a national emergency, and the restoration of the environment is of utmost importance. In his proposal, he claims that the Green New Deal could be sustained by increasing taxes of higher income households, polluters, investors of fossil-fuels, and holding them accountable – making it a proposal quite attentive towards lower-income households and social issues. Similarly to the H.R. 319 there is a mention of a free, prior, and informed consent of Indigenous peoples ensuring that they benefit from the Green New Deal. He also highlights how Native Americans and minorities have been disproportionately affected by climate change and resources extractions and promises to address “modern and historical inequities and environmental

racism” while also following the principles of environmental justice (Sanders, 2019). An issue of both proposals is that it steps on several toes – meaning that the coal- and fossil fuel industry is owned by huge corporations and lobbyists that do not want to relinquish any of their economic power. It is no wonder that every mention of a *greening* process has met with several oppositions.

Seeing that the latter is merely a proposal, and the H.R. 319 is still pending, there are not many federal frameworks in place regarding environmental protection and climate change mitigation within the U.S.’ sole territory in the Arctic, Alaska. But, again, as it is a federal entity, Alaska does have its own policies that try to curb the aforementioned issues. Starting from the energy issue, the State of Alaska has set a Renewable Energy Fund which grants loans and funds for the development of energy projects. According to the Alaska Energy Authority, this fund is a success as “every dollar deployed through the REF program resulted in \$2.07 in benefits returned to residents and the economy”, creating almost 3.000 jobs, and resulting in over \$237 million in labour income, and \$399 million in value added (Alaska Energy Authority, 2023). The main objective of this fund is to phase out fossil-fuels and to reach out to the communities in need of a reliable source of energy. Similarly, the Alaskan Renewable Energy Tax Credit provides incentives for investments in renewable energy, giving back a part of money invested in renewable energy installations in tax returns (Alaska Environment Research and Policy Centre, 2024). The Alaskan government has a State Department of Environmental Conservation, which is divided into different areas such as air and water quality control, environmental health, and tribal relations. Regarding the latter, a milestone for indigenous rights in Alaska is the 1971 Alaska Native Claims Settlement Act, which transferred over 45.5 million acres of public land to Native communities – that is, about 12% of the Alaskan territory (Alaska Department of Fish and Game, n.d.). This Act is oftentimes used by Alaskan Native communities to protect the land from environmental degradation and hazardous resources extraction and management.

Of course, the United States has signed and ratified several international treaties, such as the Vienna Convention and the Montreal Protocol on ozone-layer related matters, the UNFCCC, the London Convention, the Ramsar Convention, and the MARPOL 73/78. That does not mean that there is no care for the environment on a federal level, but the creation of something similar to the concept of the Green New Deal still has a long way to go.

Their northern neighbour, Canada, is in a similar situation. There is no plan on making a Green New Deal, despite the attempts of various civil society groups into bringing this issue closer to the federal government.⁴⁰ Canada is one of the top 10 producers of GHG emissions, and their oil sands extractions capabilities are not to be ignored – making the country itself massively dependent on resource extraction and their exports (Government of Canada, 2023). Canada is also big but sparsely populated, making several communities reliant on diesel and other fossil fuels because of the difficulty of making energy reach these areas (MacArthur, 2020). Because it is a federal entity, it is difficult for radical changes to happen unless it starts from the core government, and despite the several claims of wanting to change for the better, it seems unlikely seeing that Canada oil sands are the 3rd largest reserves in the world – and greed knows no bounds. The topic of oil sands is also quite tricky as they create an immense environmental degradation – devastation, even – but the Government has shown a continuous support of it (Government of Canada, 2020), and that might be because between 2022 and 2023 alone, within the country of Alberta oil sands royalty was \$16.9 billion (State of Alberta, n.d.). It also attracts investments from countries such as the U.S., Europe and Asia, resulting in \$313 billion in 2018 (MacArthur, 2020). Therefore, it is almost impossible to think otherwise: the fossil fuel industry is thriving in Canada and the governmental approval of a Green New Deal plan will probably be impossible – unless radical change happens. Some tentative steps have been taken, such as the funding of renewable energy power projects, but compared to the immense hold that oil sands have on the government and on various stakeholders, it is almost impossible to see a change happening anytime soon – also because some of these renewable energy practices ended up damaging the environment and the communities living close to them, as they were done without a care.⁴¹ That is not to say that there has not been a more localised push towards a betterment of the current situation, but it came from an unusual direction. Canada and its fossil fuel industry has faced several lawsuits because of the environmental degradation caused by invasive resources extractions, brought forward by indigenous groups and environmental activists – with some successful cases.

Similarly to the U.S., Canada has signed and ratified several treaties regarding the protection of the environment, such as the Convention on International Trade in Endangered Species of

⁴⁰ The *Pact for a New Green Deal* is the closest thing to GND that we can find in Canada. It is pushed forward by GreenPeace and it urges citizens to contact their MPs to make it happen within governmental discussion. <https://www.greenpeace.org/canada/en/the-pact-for-a-green-new-deal/>

⁴¹ This is the case of several litigations all over the world, but also within the Arctic. It is also the case of the ‘Prophet River First Nation v. British Columbia, 2015 BCSC 1682’ lawsuit, which will be discussed later.

Wild Fauna and Flora, the Vienna Convention and the Montreal Protocol on the Ozone Layer, the Protocol of 1978 Relating to the International Convention for the Prevention of Pollution from Ships, the Basel Convention, the Ramsar Convention, and the Paris Agreement. What has to be said about both North American countries is that, taking into account the considerations made in the first chapter, there are only a few binding agreements that can have a real impact on climate change mitigation. Therefore, environmental obligations could be seen as moral ones, rather than legal ones.

Continuing with the European Union, its authority over the matters of the environment is enshrined in the founding treaties and the other treaties it has signed, which were mentioned in the first chapter. The founding treaties provide a strong legal framework for the implementation of environmental policies. In the Treaty of the European Union (TEU) we can find Article 3, which outlines the EU's objectives, including sustainable development and the protection of the environment: “The Union shall establish an internal market. It shall work for the sustainable development of Europe based on balanced economic growth and price stability, a highly competitive social market economy, aiming at full employment and social progress, and a high level of protection and improvement of the quality of the environment. It shall promote scientific and technological advance.” This article enshrines what the European Green Deal strives to be, to keep afloat the economy while establishing a sustainable way to do so, that is mindful of the environment and of the people. It is then followed by a honourable mention in Article 21, under the General Provisions of the Union’s External Action: “The Union shall define and pursue common policies and actions, and shall work for a high degree of cooperation in all fields of international relations, in order to: [...] foster the sustainable economic, social and environmental development of developing countries, with the primary aim of eradicating poverty; [...] help develop international measures to preserve and improve the quality of the environment and the sustainable management of global natural resources, in order to ensure sustainable development”. This willingness to pursue a high degree of cooperation on the topic of climate change mitigation and environmental protection is clearly shown by the plethora of agreements that the European Union has agreed on, such as the aforementioned Kyoto Protocol and Paris Agreement, the Convention on Biological Diversity, the Convention on the Preservation of Wetlands, the Montreal Protocol and many more.

Within the other founding treaty of the European Union, the Treaty on the Functioning of the European Union (TFEU), mentions of the environment can be found within its Title XX. Said

Title is a dedicated section that outlines the European Union's powers and responsibilities in the field of environmental protection, and it also provides a comprehensive legal framework for action, ensuring a common approach to environmental issues across all member states. It comprises 3 Articles: Article 191, Article 192, and Article 193. The first article provides a framework for pursuing specific objectives, such as “preserving, protecting and improving the quality of the environment; protecting human health; prudent and rational utilisation of natural resources; promoting measures at international level to deal with regional or worldwide environmental problems, and in particular combating climate change”, while taking into account environmental principles, such as the precautionary principle and the polluter pays principle – both enshrined in the second paragraph. The following Article 192 delineates the legal basis for action, stating that both ordinary and special legislative procedures might be used to attain the objectives enshrined in Article 191. The actors of the legal framework are the European Parliament, the Council, and two Committees – Economic and Social, and the Regions Committee – are consulted when there is an action to be taken to reach the goals of Article 191. At the same time, the framework to be adopted can be provisions of fiscal nature, measures affecting the planning of countries and towns, the management of water resources and land use. This article also introduces the topic of energy management, which will be analysed in the next paragraph. Finally, there is Article 193, which asserts that member states can introduce “more stringent measures” or strengthen already existing ones in pursuing environmental protection within their borders.

The following title found within the TFEU is Title XXI, which pertains to Energy management, and it comprises only Article 194. Energy is very important to the aims of the Green New Deals, as a shift from carbon-based energy to sustainable and clean energy will undoubtedly reduce pollution and environmental degradation: this process is called *decarbonisation*, and it is the foundation of Green New Deals, including the European one. Said article aims at creating a unified energy market that is both efficient and secure, prioritising energy efficiency, renewable energy development, and the creation of interconnected energy networks across member states. It is important to point out that Article 194 paragraph 2 asserts that member states have a right to “[...] determine the conditions for exploiting its energy resources, its choice between different energy sources and the general structure of its energy supply [...]”. All these provisions enable the European Union to set common standards, promote sustainable development, and address environmental challenges at the European level – therefore they also provide a strong legal basis for the development of the European Green Deal and similarly related policies.

The European Green Deal, presented in 2019, strives to make the European Union the first climate-neutral continent by cutting GHG net-emissions to zero by 2050, transitioning to an economic growth that is separated from resource use and leaves no one and no place behind (European Commission, 2021b). It addresses energy, climate, and environmental challenges. Growth is quintessential for the European Union, seeing that it can be considered an economic union, and the European Green Deal requires a significant amount of money to reach its goals – thus the focus on making it a green, and *just* transition. The most capital-intensive change will be the shift to renewable energy, seeing that most European countries are proficient carbon-based energy users, and substituting that requires a lot of work. Renewable energy means “[...] energy from renewable non-fossil sources, namely wind, solar, aerothermal, geothermal, hydrothermal and ocean energy, hydropower, biomass, landfill gas, sewage treatment plant gas and biogases” (Directive 2009/28/EC, Art. 2). This is where the EGD comes in, which provides – with several funds put into place – member states the means to decarbonise and switch to clean energy, by building new infrastructures, researching and exploring the land to find new resources, and training energy-sectors workers to adjust to new technologies. Broadly speaking, there are several key aspects of the European Green Deal related to energy and energy management. As previously mentioned, the first one is decarbonisation: the EGD aims to phase out fossil fuels and replace them with clean, renewable energy sources, which includes investing in renewable energy technologies like solar, wind, and hydropower, as well as promoting energy efficiency and reducing energy consumption. Two other key elements are energy infrastructure and energy efficiency: the EGD aims at modernising and improving the current energy infrastructure to fully accommodate the transition, investing in smart grids, transmission lines, and other infrastructure necessary for integrating renewable energy sources and ensuring a reliable energy supply. Said supply will be assisted by the implementation of measures to reduce energy waste and optimise energy use, such as upgrading building insulation, using energy-efficient appliances, and improving transportation infrastructure. There is then the matter of energy storage, another key element of the EGD, which will be essential to better respond to the demand of energy in the case of intermittent resources, such as solar or wind powers.

Last, but not least, to sustain all these innovations, the European Union has decided to focus on renewable energy. An ambitious target was set: to increase the share of renewables in the energy network from 23% to 45% by 2030, involving the support of the development and the

deployment of new and greener energy technologies, providing incentives for renewable energy projects, and ensuring a reliable and integrated renewable energy system.⁴² One could argue that renewable energy became the core of energy policies in the Union, and also became one of the key points of the European Green Deal. A first step towards the use of renewable energy was the Renewable Energy Directive 2009/28/EC, adopted in 2009, which pledged to reduce GHG emissions according to the Kyoto Protocol by increasing its use of renewable energy. The Directive had set mandatory national targets for the “[...] overall share of energy from renewable sources in gross final consumption of energy and for the share of energy from renewable sources in transport. It laid down rules relating to statistical transfers between Member States, joint projects between Member States and with third countries, guarantees of origin, administrative procedures, information and training, and access to the electricity grid for energy from renewable sources” (2009/28/EC, Art. 1). Each Member State ought to have reached a target of at least a “[...] 20% share of energy from renewable sources in the Community’s gross final consumption of energy in 2020”, by cooperating with local, regional, and national authorities, statistical transfers and joint projects (Art. 3 para. 1; Art. 4 para. 1). It essentially required Member States to develop national plans, set targets, and report on their progress regularly. On par with the always present need of growth, it also outlined various financial and policy tools to encourage investment in renewable energy sources, such as subsidies, certificates, and international cooperation.

In 2019 the *Clean energy for all Europeans package* was introduced, alongside the entry into force of an updated version of the 2009’s Directive. Said package consists of 8 legislative proposals, directives and regulations, that the Member States will have to adhere to. These proposals cover several topics, from energy security to energy governance and, of course, energy market and renewable energy – with the new Renewable Energy Directive (2018/2001). This directive was to be transposed into national law by 2021, implementing the reaching of a binding target of at least 32% of gross final energy consumption by 2030, and a 14% target for the share of renewable fuels in transport by 2030. In accordance with it, Member States had to develop a 10-years plan to reach the Directive’s goals, called National Energy and Climate Plans (NECPs), that will be closely monitored by the European Commission, which can take action to ensure they align with the European Union's overall objectives. The 2018 Directive underwent another revision in 2023, bringing the protection of the environment and climate

⁴² As of 2022, renewable energy accounted for 23% of the European Union’s energy consumption. <https://www.europarl.europa.eu/factsheets/en/sheet/70/renewable-energy>

change mitigation closer to the energy aims of the Union – and intertwining it with the European Green Deal: in the preamble of the Directive 2023/2413 the first paragraph openly mentions the EGD, and it states that “The Union’s climate neutrality objective requires a just energy transition which leaves no territory or citizen behind, an increase in energy efficiency and significantly higher shares of energy from renewable sources in an integrated energy system.” The Directive then goes on by asserting that the energy sector is a major contributor to GHG emissions, reaching highs of 75%, and renewable energy could be the solution to curb a degradation of our soils, skies and waters – aiding in the fight against climate change and addressing other environmental challenges like biodiversity loss and pollution. A focus is also given on the possibility of economic growth with this new sector, as sustainable energy can shield consumers from price fluctuations that are common with fossil fuels and by creating new jobs, fostering local industries while meeting increasing global demand for clean energy technology. Differentiating from the 2018/2001 Directive, the target of share of renewable energy in the Union’s gross final consumption of energy should reach at least 42,5% instead of 32%.

From 2022 onwards, many documents related to energy matters started to incorporate a political emphasis, as the European Union started to cut ties with the Russian Federation after its attack on Ukraine, which also meant a phasing out of the Russian's supply of energy. The aforementioned Directive 2023/2413 attributed the instability of energy prices and markets because of the attack, and the creation of another package called REPowerEU, will also highlight this incrimination (preamble, para. 4 and 5). The Communication set out by the Commission to present this package starts with a straightforward accusation, claiming that “[...] Russia’s unprovoked and unjustified military aggression against Ukraine, has massively disrupted the world’s energy system” (COM/2022/230). Therefore, the need to augment the development of renewable energy is not only accentuated by the need to combat climate change and environmental degradation, but also to become less dependent on foreign (extra-EU) supply of energy. To do so, the European Union has accelerated the granting processes for new renewable energy projects – meaning that approvals for new renewable energy installations should now take no longer than 12 months in priority areas and 24 months elsewhere (COM/2022/230). This acceleration is seen in the outcome of the first two years of the REPowerEU implementation: gas consumption decreased by 18%, the dependency on Russian gas has been overcome, access to secure and affordable energy has been ensured, the numbers of renewable energy installations have increased, and, for the first time ever, the European

Union has produced more electricity from wind and solar than from gas (European Commission, 2022b).

To pursue all the above goals, there needs to be capitals, money-wise and material-wise. In the first case, the setting up of several funds – such as the Just Transition Fund or the European Regional Development Fund – shows the world that the European Union is capable of reaching its promised goals, but in the second case it is not as easy. There is a will and a way, but the materials to advance their green and energy agendas are lacking within the European borders. In order to do so, the Commission proposed a plan to guarantee the EU's access to essential raw materials, including those that are crucial for industries like clean energy, technology and to meet its climate objectives. The plan aims to ensure a secure, diverse, affordable, and sustainable supply of these materials and resulted in the *Critical Raw Materials Act*, which came into force in 2023. It divides raw materials into two categories, strategic and critical raw materials. The first are defined as materials that “score among the highest in terms of strategic importance”, and therefore have a high strategic importance and might face a supply and/or demand imbalance on global markets (Art. 3 para. 2). Strategic raw materials are the following: bauxite-alumina-aluminium; bismuth; boron, metallurgy grade; cobalt; copper; gallium; germanium; lithium, battery grade; magnesium metal; manganese, battery grade; graphite, battery grade; nickel, battery grade; platinum group metals; rare earth elements for permanent magnets (Nd, Pr, Tb, Dy, Gd, Sm, and Ce); silicon metal; titanium metal; tungsten (Annex I).

Critical raw materials are also very important for the economic growth of the European Union and might face supply disruptions – hence the reason why it is very important to assure their availability within internal markets. Critical raw materials are the following: antimony, arsenic bauxite-alumina-aluminium; baryte; beryllium; bismuth; boron; cobalt; coking coal; copper; feldspar; fluorspar; gallium; germanium; hafnium; helium; heavy rare earth elements; light rare earth elements; lithium; magnesium; manganese; graphite; nickel, battery grade; niobium; phosphate rock; phosphorus; platinum group metals; scandium; silicon metal; strontium, tantalum; titanium metal; tungsten; vanadium.

The following table showcases which strategic and critical raw materials are needed to develop energy installations. Aside from a very few materials, such as Bismuth and Boron – both used for defence and artillery uses – the majority are widely used among different energy infrastructures.

Table 1 – Usage of Raw Materials of Annex I in Electric and Technological fields.

| Raw Materials | Wind | Solar | Hydro | Geothermal | Energy Storage | Nuclear | Gas | Coal | Carbon capture & storage | Semiconductors |
|---------------|------|-------|-------|------------|----------------|---------|-----|------|--------------------------|----------------|
| Aluminium | X | X | | | X | X | X | X | X | X |
| Bismuth | | | | | | | | | | X |
| Boron | | | | | X | | | | | X |
| Chromium | X | | X | X | X | X | X | X | X | X |
| Cobalt | | | | | X | | X | X | X | X |
| Copper | X | X | X | X | X | X | X | X | X | X |
| Gallium | | X | | | | | | | | X |
| Germanium | | X | | | | | | | | X |
| Graphite | | | | | X | | | | | |
| Indium | | X | | | | X | | | | X |
| Iron | X | | | | X | | | | | X |
| Lead | X | X | X | | X | X | | | | X |
| Lithium | | | | | X | | | | | |
| Magnesium | | | | | | | | | | X |
| Manganese | X | | X | X | X | | X | X | X | |
| Nickel | X | X | X | X | X | X | X | X | X | X |
| Platinum | | | | | X | | | | | X |
| REE* | X | X | X | X | X | X | X | X | X | X |
| Silicon | | X | | | | | | | | X |
| Silver | | X | | | | X | | | | X |
| Titanium | | | X | X | | X | X | X | | X |
| Tungsten | X | X | | | | | | | | X |

Data extrapolated from Annex I and the World Bank

A cross-reference search between Annex I and Annex II of the Act and data collected by the World Bank and other relevant institutes, will show that to advance the various agendas most of the strategic raw materials present in the annexes are needed. A study by Hund (2020) tells us about the future demand of materials. Using data a prediction was made of the materials that will be needed in 2050: iron demand is expected to rise up to a demand of 350 millions of tons (mt); aluminium of a 200 mt; copper of 47 mt; zinc of 54 mt; lead 19 mt; nickel 11 mt; chromium 11 mt; manganese 2.8 mt; molybdenum 1.2 mt; silver 0.6 mt; neodymium 0.3 mt. It is no wonder then that the European Union decided to bring forth a document such as the Critical Raw Mineral Act as they need to be assured that they have at least some semblances of control on the materials needed to fund and push forward the plethora of policies implemented. This list is also interesting as a quick research on each material can show us that

the majority of their provenance is from outside the European borders (RMIS, n.d.). Finally, the list of materials considered to be of the utmost importance by the European Union can be used universally, as many countries all over the world are trying to invest in sustainable technologies – therefore a rush to own the needed resources is to be expected, which might result in a *scramble for minerals*, causing either competition, or maybe cooperation between the European Union and foreign countries (Bukowski, 2023).

In conclusion, it is undoubtedly true that to fund the green transition there needs to be several raw materials at hand, making the Green New Deals and the European Green Deal *mineral intensive*. Of course, the acquisition of these minerals does not happen in a vacuum: extraction has externalities, transporting the materials has externalities, the creation of extractive instruments has externalities, and even the materials themselves have externalities as many of them are difficult to dispose of. This is where a different outlook should come in, that of the concepts of a weaker and stronger sustainable model. The first one is the most common form of sustainable development, where what is important is the continuation of an economic growth that also supports environmental protection – while the second is about *degrowth*. This stems from Arne Næss' *deep ecology*, where nature and its resources should be important and protected regardless of their use to humans and to the economy. Degrowth is almost unheard of when it comes to Green New Deals, but it is rather common within academic discussions and could be a solution for the inevitability of emissions even if renewable energy is deployed.

3. Sustainability Models and Degrowth

As reported in the previous section, something that is very prominent within the various Green New Deals is the topic of economic growth. In a way, this ceaseless mantra almost sounds like some sort of reassurance – as if switching from fossil fuels to renewable energy would imply a *loss*, in this case an economic loss. Within the European Union dedicated website, in all its policy documents it is repeated constantly, claiming that the European Green Deal will not only bring economic growth, but it will also stimulate it and further it. It seems as a way to claim that investing in renewable energy will bring more wealth than investing in fossil fuels, making the *green* market more appealing to venture capitalists. It might be jarring to think of something revolutionary as the European Green Deal as only a means to deepen the pockets of a selected few while also, almost as an afterthought, improving the conditions of the environment and of citizens. It was mentioned how the U.S.' proposal for a Green New Deal was mainly illustrating the benefits it would bring to the economy and job market, rather than protecting the

environment in and of itself. Or, in Canada’s case, the unwillingness of parting with the billions of dollars made from oil sands, despite the catastrophic externalities for humans and the environment.

Sustainability can be categorised in two ways: weak sustainability, and strong sustainability. The first posits that natural resources, and natural capital, can be substituted for human-made capital. Technological advancements are seen as a way to generate solutions to the environmental issues created by the never-ending production of goods and services (Ekins, 2003). This means that economic growth and technological advancements can compensate for the depletion of natural resources. Strong sustainability affirms the contrary, that natural resources are irreplaceable and cannot be viewed as a mere ‘stock’ that can be taken and used carelessly – as while human-made capital can be reproduced continuously, natural capital has a limit that should be dutifully acknowledged. Natural capital can be seen as complementary to human-made capital, as it also offers goods and services: it produces well-being, such as biodiversity, clean air, clean waters, rich soils – it matters not advanced good technology is, it will not be able to substitute for environmental losses. To conclude, strong sustainability advocates for preserving these resources and ensuring that they are not depleted at a rate faster than they can regenerate – together with the thesis of degrowth, an approach that is developing alongside strong sustainability.

The mainstream Green New Deals movement could be categorised as *weak sustainability*: in the words of Norwegian philosopher, Arne Næss, it is a shallow movement, where the central objective is the “health and affluence of people in developed countries” (1973). And it is difficult to say the contrary when the proof is not only visible, but also recorded and reported. As previously mentioned, most of the raw materials needed to sustain green policies are found in places with questionable leaderships, who would put money above the lives of their own citizens.⁴³ The atrocities happening in the Democratic Republic of the Congo to extract cobalt are not only well-known but also well documented, and when the European Union pushes its goal of zero GHG emissions by investing in an e-revolution, one has to draw the conclusion that cobalt has to be mined from somewhere, and that is the DRC.⁴⁴ Two of the major European car companies, BMW (2020) and Mercedes (2023), both admit that they acquire cobalt to make

⁴³It is noted that most minerals needed are found in countries with a low democracy index, where people are forced to work in terrible conditions to extract the materials needed to sustain GNDs of the Global North see RMIS, n.d.

⁴⁴ The DRC is one of the main producers of cobalt. In 2023 they produced 69.2% of worldwide cobalt. <https://rmis.jrc.ec.europa.eu/rmp/Cobalt>

batteries for their electric vehicles from the DRC. Both companies assert that they are ‘doing their best’ at examining “the origin of this raw material very closely and critically” (BMW, 2020) and improving “the local situation for the people working there and to strengthen their rights” (Mercedes, 2023) – it almost feels tasteless. The DRC government is rife with corruption, also considering that police officers and military men are not allowed near mines because of a risk of blood minerals, meaning that there are not many ways to keep an eye on the respect of the miners’ human rights (Ojewale, 2024). Because of a lack of an institutional framework surrounding the work in the mines, the work conditions of miners are comparable to slavery, with death, rape, and child labour being a daily occurrence. It reached to a point where a man immolated himself while carrying a ‘Stop Genocide in Congo’ sign to denounce the atrocities happening that are fuelled by the unregulated resource extraction (Mtembu, 2023). If that is not enough, the poor safety conditions in which Congolese people are forced to work have severe repercussions on their health, as fine dusts that inevitably arise from mining will attack the eyes, lungs, and hearts of the miners. Cobalt is also very toxic for the environment: it contaminates the air, the soil, and water. High concentrations of cobalt have been linked to the degradation of local ecosystems, including crops and worms, making the land infertile. In bodies of water near cobalt mines, waters and fishes have been found to be contaminated, which also has a direct effect on human health through their consumption. Furthermore, cobalt has been classified as a possible carcinogen and radioactive element, exacerbating its hazardous nature. The mining process itself contributes to air pollution, with the surrounding areas often shrouded in a haze of dust and grit, making it toxic to breathe. Children born out of parents that have worked or live close to mines have a higher risk of having birth defects (Davey, 2024). To conclude the picture, the continuous conflicts that are tearing the DRC since the 1990s have claimed at least 6 million people, and many of them were fuelled by the desire to own and control the abundance of the land (Moszynski, 2008). As most countries are rushing, *scrambling*, for minerals and other resources, one can expect the situation to grow worse if not dutifully regulated. Repeating the words of Arne Næss and keeping in mind what is happening in the DRC to allow the Global North to feed its consuming habits of electric devices, it seems indeed a shallow movement.

If the point of the Green New Deals is to cut emissions, it almost seems like a logical conclusion that the most impacting sectors should be slowed down – or should produce less. This is where the concept of degrowth comes into play. Degrowth challenges the current global capitalist system, which, as shown previously, prioritises and promises endless growth at any cost. This

growth often leads to exploitation and environmental damage, and degrowth argues for a shift towards societies that value social and ecological well-being over corporate profits and excessive consumption. This involves redistributing resources, reducing economic activity, and embracing values like care, solidarity, and autonomy. Strong sustainability has a more comprehensive approach, putting more emphasis on the environment in and of itself, and on everyone that lives within it, rather than the economic gains plus the environment. Riccardo Mastini, Giorgio Kallis and Jason Hickel have skilfully compared degrowth to the mainstream approaches of the Green New Deals in their paper titled *A Green New Deal without growth?* (2021). The idea behind their theory is that while GDP might go down, the quality of life might go up. GDP growth can force the carbon emission curve higher, and that is also another point to take into consideration when talking about sustainability: a weaker concept of sustainability might also imply a disregard for the externalities surrounding the extractive business, as shown with the DRC. Mineral intensity to sustain the renewable energy is “higher than that of fossil fuels: producing 1 kWh of electricity from renewable energy requires 10 times more metals than from fossil fuels [...] Increasing the extraction of these minerals will further drive ecological breakdown, and in some cases limited resource availability may limit the expansion of renewable energy [...] can mitigate some environmental impacts, but only at the expense of exacerbating others” (p.5). Conflicts to acquire and own resources are already happening all over the world, and if Global North countries are scrambling for resources, which are limited and will go through shortages soon, it is inevitable that conflicts will worsen (Zheng et al., 2022). The externalities generated by extractions have negative repercussions on the land, and that may also cause environmental conflicts over the control of the remaining land and waters that are accessible and not polluted. The authors propose three strategies to incorporate degrowth into mainstream Green New Deals. First, public expenditures should not be involved with less necessary sectors such as the military and defence ones. Second, the earnings of a progressive taxation on corporations and private savings could fund the green transition, limiting wealth concentration in the hands of a selected few and curb excessive consumption. Third, governments can create debt-free money through their central banks. This money can then be directly spent on public projects without requiring economic growth to repay debts. This approach can free up resources for investment and reduce reliance on debt-based financing (Mastini et al., 2021). This can be coupled with Paul Ekins and Dimitri Zenghelis theories, that of the *triple-Ds*: “*decarbonisation*, to reduce the level of global warming; *detoxification*, to reduce the emissions or impacts of other pollutants; and *dematerialisation*, to reduce the environmental impacts associated with resource extraction, conversion and processing” (Ekins

& Zenghelis, 2021, p. 950). This can be achieved through a slowing down of energy consumption: “reductions in energy demand can best be achieved by reducing material throughput, since material extraction and consumption is a major driver of energy demand. This approach to reducing material throughput has the added benefit of releasing pressure on ecosystems (i.e., land-use change, biodiversity loss, etc.)” (Mastini et al., 2021, p. 7).

Seeing that Green New Deals have been coupled with growth since the beginning by comparing it to the F.D.R.’s New Deal, it seems likely that degrowth cannot happen within a capitalist society as it may result in the instability of institutions that depend on growth and it may also result in a radical change of lifestyle, where citizens will be asked to renounce their consumerist habits. It would seem that the Green New Deals and degrowth are, as of right now, inconceivable together, as degrowth advocates for radical social changes and GNDs advocate for technology, development, and large flows of money, intensifying market relations (Dunlap & Laratte, 2022). It is, of course, not true that the GNDs do not care for social issues, since it places a big emphasis on a just transition where no one is left behind, but policymakers must consider the social and environmental costs of extracting the materials needed for the green transition, especially in the Global South. Simply replacing a destructive fossil fuel industry with another exploitative industry goes against everything the green transition should stand for (Dunlap & Laratte, 2022).

4. Gaps in Climate Change debates: externalities of resource extraction and production

Externalities during resource extractions and production processes are no laughing matter and are seen by some as a *rite of passage* before becoming a successful and industrialised country. It is at the base of the ‘grow now, clean up later’ mindset that can be analysed when looking at Asian countries: outstanding economic performances allowed countries to grow in astonishingly short periods of time, bringing wealth and benefits to its citizens, rising from being a ‘backwards’ countryside state to being considered one of the main trade competitors of the United States.⁴⁵ But this outstanding growth has drawbacks, and that is a scarcity of natural resources, widespread pollution, and environmental degradation. In a sense, there is the general belief that after growing, there will be enough money and technology to fix the damage done

⁴⁵ That is the case of China, which is part of the so-called East Asian Miracle, where underdeveloped countries underwent such a rapid transformation in less than 40 years that they are now financial markets and leaders in specific technological sectors – and this growth does not seem to stop.

during the growing period (Ekins & Zenghelis, 2021, p. 950). The IPCC has made an estimate, that if the world keeps growing and producing at this rate, the damages from climate change is about 15-38.5 trillion dollars, yearly (IPCC, 2018, p. 256). This intense production and extraction of resources has tripled since the early 70s, with fossil fuels use increasing from 6.2 to 15.4 billion tonnes, biomass from 12.6 to 24.8 billion tonnes, from metal ores from 2.6 to 9.6 billion tonnes, and non-ore metallic minerals going from 9.6 to 45.3 billion tonnes (UNEP, 2024, pp. 27-28). This has undoubtedly repercussions and severe impacts on the environment. Biomass production is a major contributor to biodiversity loss and water scarcity, accounting for nearly 90% of these issues. The extraction of natural resources, including fossil fuels, contributes significantly as well, as it accounts for half of all greenhouse gas emissions and 30% of the health risks associated with particulate matter (PM) pollution (*Table 2*). Households and the remaining economy also have an impact on climate change and on the health risks associated with PM pollution, having an impact of 35% on the first, and 60% impact on the latter.

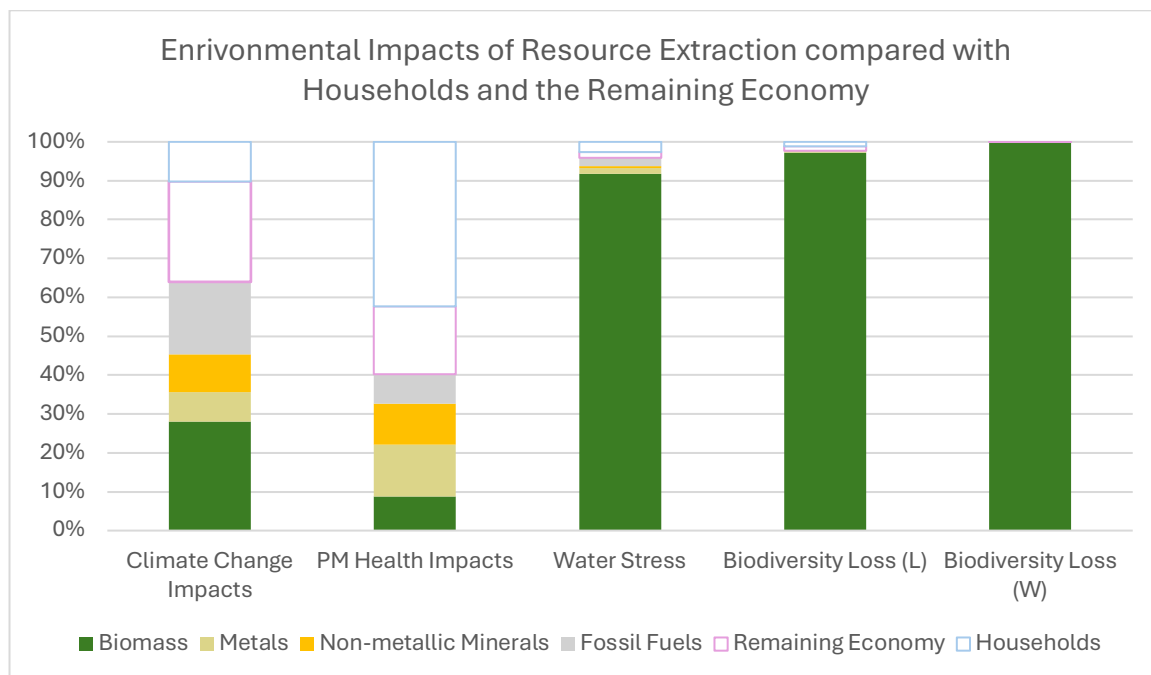


Table 2 – United Nations Environment Programme (2024). *Global Resources Outlook International Resource Panel*. Nairobi., page 51.

From looking at the above table, there is no doubt that the effect of resource extraction and production on our planet will have severe repercussions, and it is also improbable that Earth's natural system will sustain the damage inflicted upon it. If no change is made, future trends have predicted that between 2020 and 2060 resource extraction will increase up to 60%,

biomass extraction up to 80%, energy production up to 50%, and the use of agricultural area up to 5% (p. 83). On the other hand, if effective climate change mitigation policies are applied, the future trends predictions will change and have a more positive outlook: “In the Sustainability Transition scenario, key impact indicators are projected to fall below current levels by 2060 [...] along with slower growth in resource-based pressures [...]. Greenhouse gas emissions fall by around 80% by 2060 compared with 2020 levels. The area of crop and pasture land both fall, with agricultural land area contracting by 5% by 2060. Energy-related pressures fall to 25% below 2020 levels by 2060. Global resource extractions slow from 2030 to peak in 2045, and then settle at around 20% above 2020 levels by 2060. The mix of resource use shifts towards renewables, with food and fibre biomass extraction increasing by 40% to 2060” (p. 106).

The ‘grow now, clean up later’ mindset feels pointless when looking at this data. No amount of money will be able to fix the environmental damage caused by resource extraction and production, unless effective environmental policies are employed. Humanity, Ekins claims, either manages to lower global temperatures or nature does it for us by depopulating and deindustrialising our planet (Ekins & Zenghelis, 2021, p. 954). In this case, degrowth would be one of the most appropriate solutions to this issue. As mentioned before, it seems unlikely that it will ever be put into practice on a large scale, especially seeing that the ‘grow now, clean up later’ mindset is oftentimes accompanied by the idea that growth will eradicate poverty. But the bottom line is that with the loss of natural capital, of natural resources, there is a constraint on economic growth: if the soil is barren, no agriculture can happen; if the waters, air, land, are polluted, there will be increased health risks that will spread diseases and decimate our populations (Vidal, 2023).

Dunlap and Laratte argue that Green New Deals prioritise market expansion, resource extraction, and infrastructure development, often at the expense of communities and the environment. They criticise the GNDs’ framing of intensive resource exploitation as a necessary step for addressing climate change (p. 2). In their words, there is no fossil fuels versus renewable energy dichotomy, as there is a close relationship between the extractive business – mining and fossil fuels – and low-carbon infrastructures. Green New Deals and their need for resources also play a relevant role in the degradation of the environment: metals and non-metallic minerals amount to around 20-25% of the damaging impact that fuels climate change, and around 35% of the extraction has an impact on human health (*Table 2*). Green New Deals

are mineral intensive, and to sustain its goals means a fast spreading of low-carbon and renewable-energy infrastructures which ignores the intensive extractive practices and intensive land-use. Said low-carbon infrastructures not only have negative consequences on the environment, but also on the social-economic reality of our societies. One way to corroborate Dunlap and Laratte's claim of the non-existence of a dichotomy between the two, is their report made by interviewing energy sector workers and representatives, who claimed that once produced, "[...] energy ends up in the same grid. So, when companies or individuals promote the fact that they are consuming green energy, it is a purely commercial move" (Dunlap & Laratte, 2022, p. 6). Furthermore, as it has been reiterated many times, the materials needed to bolster the Green New Deals and its infrastructures, such as solar and wind power plants, electric mobility and digital technologies, are all material intensive. Some of the symbols of the green revolution are electric vehicles, which require four times more copper than a gasoline car (p. 7). Since it has been already mentioned that the Green New Deals, as they are right now, are a form of capitalism – we could rename it as *green capitalism*. "The clean energy transition is expected to be much more mineral intensive than fossil-fuel based electricity generation" (Hund et al., 2020, p. 37).

Something that is also not often taken into account, is the externality generated *around* the production. In some cases, we can talk about recycling, both of the raw materials and of the product made by said materials. In other cases, especially when talking about the energy sector, externalities are generated when infrastructures are in use. Until now the kind of externalities that were described are the more tangible ones, such as climate change impacts, pollution, health deterioration caused by PMs, and economic ones – but something that was scantily mentioned is the social externalities. One does not need to destroy the land to generate externalities. As previously said, Dunlap and Laratte argue that Green New Deals development is often at the expense of communities. In their work, they visited the St. Victor energy transformer, which can be found between Spain and France. This project was made in the name of energy transition and renewable energy, in line with the aims of the European Green Deal. This specific case is interesting because it resulted in the failure to notify the residents of the area where the power lines would be built, expropriating them of their farmland too. This project was met with resistance, both legally speaking – with legal battles being initiated over the injustice of expropriation, but also because of health-related issues caused by the presence of power lines – and physically speaking. The occupation of the project land lasted about 10 years, before the camp was bulldozed through and quickly destroyed. This farmland area is

now occupied by a 14 metres-deep hole that covers the area of a small airfield – destroying the lush land, cutting trees, and making the soil arid (Dunlap & Laratte, 2022, p. 8). The transformer grid was linked through the power lines of another project that also resulted in a conflict, that of the wind turbines built in Bouriège and St-Sernin. The project ended up destroying the local forests and ancient ruin sites, cutting down trees to build the wind turbines and to build the roads needed to reach up the infrastructure. If that was not enough, the St. Victor energy transformer was connected to high-tension power lines crossing the eastern coast of Spain – which also brought several conflicts before, during, and after the building of the infrastructure – reaching all the way down to Morocco, more specifically Occupied Western Sahara. Dunlap calls this a classic case of ‘*greenwashing*’, or green colonialism, as Morocco is seeing in a better light because they are helping Europe with their struggle to have energy reserves – but the energy is being stolen from a land that it is not theirs. Morocco is illegally occupying the Western Sahara, and it is known how they are stealing away resources that are not theirs to take.⁴⁶ This energy supply, which is as shown directly linked to Europe, fuels Moroccan colonialism and occupation (Dunlap). In an interview reported by Dunlap and Laratte, a man says the following words: “Renewable energy is not produced in Morocco and carried all the way to Belgium, even if it is produced by wind turbines. That is capitalism. Renewable energy is instead the self-production and local consumption of electricity. You can sell me ecological organic fruits from Peru, and I can eat it here, but then it is not ecological” (Dunlap & Laratte, 2022, p. 14). This, in a sense, is the confirmation of the lack of dichotomy between fossil fuels and renewable energy: they both damage the environment, and they also damage social realities. Externalities inflicted upon social realities might endanger the lives of people from a different point of view: in some cases it forces people to abandon their livelihoods, and to move out of their areas of residence, disrupting their lives; in other cases, it perpetuates an unequal power relationship, where control is asserted over a part of the population, and that is the case of several indigenous populations all over the world – and the Arctic.

4.1 The Intersection between Green Colonialism and Green Capitalism

The issue of green colonialism deserves a separated section, as it is also one of the major points of interest of this thesis. As seen in the previous section, the issue with extraction and

⁴⁶ This refers to the Fishing Treaty between the European Union and the Kingdom of Morocco, which entirely depended on fishing off Western Sahara’s shores. <https://wsrw.org/en/news/eu-evaluation-confirms-eu-morocco-fisheries-depends-on-illegal-occupation>

production have been brought to light, especially the externalities both produces. The Green New Deals have been marketed as *the solution* to fix climate change, without taking much into account the fact that it presents itself as a new form of capitalism, a green one, while perpetuating the same damages as the fossil fuel industry. Some countries are abundant in resources, some are not, and others are abundant in only a specific one. Therefore, it is expected that to finance and move forward all these new capitalistic ventures, there needs to be all sorts of materials. Some countries do not have to look that far away, as certain areas are rich in resources and do not even require special permissions, as said areas are sparsely populated – or at least, they are populated by people who are not held in any regard by those who have a say in politics or policies. We have seen something not too dissimilar previously when talking about DRC and Western Sahara: the first is being subjugated internally, but also externally, with the promises of money and investments coming from western deep pockets; the second one is a vast area that should have been recognised internationally as its own country, but because Morocco claimed that, historically, that area belonged to the Kingdom, it occupied it and not many countries bat any eyes. Both situations are unlawful, but there is money to be taken into consideration, which always brushes off the respect of human rights.

Green capitalism, as seen before, is the practice of countries, governments, corporations, to present themselves as contributors of sustainable development but by perpetuating the same capitalistic actions that are characteristic of fossil-fuels societies, harming the environment at the same time. Green capitalism perpetuates existing power inequalities and structures by prioritising growth over actual long-term environmental protection and sustainability. Green colonialism, or green imperialism, is the practice of promoting green policies that exploit third parties – Indigenous peoples, minorities, developing countries, the Global South. The Global North achieves its richness, its healthy environment goals by exploiting and degrading the land of the aforementioned groups, through green capitalism. As capitalism and colonialism went hand in hand, so do their greener counterparts: these two concepts intersect when green capitalism is used to justify and perpetuate colonial power dynamics, resulting in the extraction of resources and the imposition of environmentally harmful practices in the name of sustainability.

The intersection between green colonialism and green capitalism is becoming increasingly evident in the Arctic, a region where indigenous communities are disproportionately affected by climate change, environmental policies, and economic activities such as extractive

businesses. As climate change exacerbates, the Arctic has emerged as both a symbol of environmental fragility and a lucrative frontier for green capitalist ventures, including renewable energy projects and resource extraction framed as sustainable. However, these initiatives often replicate colonial practices by marginalising indigenous voices and disregarding their traditional knowledge and land rights. Green colonialism, similarly to the case study of St. Vincent, refers to the imposition of environmental policies that prioritise national interests over the needs and rights of local populations, particularly Indigenous peoples. This dynamic exacerbates the socio-economic and cultural challenges already faced by Arctic indigenous communities, as they are coerced into participating in or being displaced by projects that serve the broader goals of green capitalism. The clash between these national and global environmental policies, such as the GNDs, and indigenous sovereignty raises critical questions about whose interests are truly served under the guise of sustainability, and how these practices perpetuate historical patterns of exploitation and marginalisation in the Arctic.

5. The Exploitation of the Arctic under the guide of sustainability

As claimed before, raw materials and their extraction, processing, and manufacturing are central to green energy development, but green policies such as the GND “reinforces and intensifies socio-ecological destruction, in the name of environmentalism. This entails spreading and intensifying processes of extraction, infrastructural colonisation and market relationships implicitly dependent on increasing energy consumption. [...] These impacts spread, as small villages and whole regions become divided, while conflict ferments and—with the failure to stop the projects—more ecosystems are colonised, resulting in tree killing, soil compaction, biodiversity loss and the proliferation of toxic materials over habitats with road and HVPL [high-voltage power lines] construction”. Increased pressure on indigenous lands – in the Arctic but also outside of it – to supply the green transition generates ‘green sacrifice zones’, which means the sacrificing of areas to advance the green agenda. The term sacrifice zone originates from the Cold War, and it was used to name the areas that were highly contaminated by nuclear wastes or by externalities from uranium extraction. For example, the mining needed to power the GNDs will pressure the environment, and the extraction of minerals such as cobalt can contaminate the soil, and therefore become a green sacrifice zone (Zografos & Robbins, 2020). Legal battles in the Arctic are intertwined with green colonialism and green capitalism, which have become a battlefield for indigenous communities seeking to protect their rights and lands from encroaching environmental and economic interests. These

legal struggles often involve indigenous groups challenging the legitimacy of green capitalist projects – such as wind farms, mining, and hydroelectric dams – that are promoted under the banner of sustainability but threaten their traditional territories and ways of life. In many cases, these projects proceed with insufficient consultation or outright disregard for indigenous consent, violating international legal frameworks like the aforementioned United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP), which enshrines the right to Free, Prior, and Informed Consent (FPIC). It is interesting to note how the FPIC is present in the H.R. 319, in Bernie Sanders’ GND proposal, and in a few policy documents related to the European Green Deal – while institutionally speaking, this right has been recognised only by European Arctic Countries and recently by Canada as well.⁴⁷

Compared to the European Union, in North America, particularly in Canada and Alaska, the local indigenous groups have been very active on the legal front to protect their lands. It is, in principle, something they have fought for centuries, as their lands had been stolen and exploited since the first colonisers touched the soil of Turtle Island. These regions, rich in natural resources and positioned as critical areas for extractive and energy projects, either renewable or not, have become a *ground zero* for conflicts between indigenous communities and both governmental and corporate entities. Under the guise of sustainability in the case of renewable energy, or under the guise of a public goods and services for the other, these projects frequently occur on indigenous lands without adequate consultation or consent, leading to accusations of green colonialism – where environmental initiatives are imposed in a manner that disregards indigenous sovereignty and exacerbates historical injustices.

A solution offered by Dunlap and other academics that is worth mentioning is the ‘community renewable energy ecologies’ (CREEs), which encourages local communities to develop their own approaches to renewable energy infrastructure and manage them themselves. It is a decentralised system, where knowledge and understanding of the local environment is tailored to meet the specific cultural, social, and economic needs of the community, while, in the case of Indigenous peoples, respecting traditional knowledge and practices. These community-based initiatives prioritise local autonomy and sustainability, allowing Indigenous peoples to generate clean energy in ways that support their cultural practices, protect their lands, and

⁴⁷ Canada and the United States were 2 of the 4 who were against the United Nations Declaration on the Rights of Indigenous Peoples. In 2017 the Canadian state of British Columbia declared that it would implement the UNDRIP in its legislation. In 2020 the Minister of Justice promised it would align Canadian law with the UNDRIP, and the following year it received a royal assent and is now on the way to be fully implemented within the Canadian body of law.

enhance their economic self-sufficiency. For example, an indigenous community might install solar panels to power homes, schools, and common areas, reducing their reliance on expensive and polluting diesel generators. This approach not only provides clean energy but also fosters local expertise in renewable energy technologies and creates jobs within the community (Duran et al., 2024). At the same time, if the FPIC right was to be respected by central authorities, it would work well hand in hand with CREEs, giving indigenous populations the opportunity to meaningfully participate in the planning, development, and operation of renewable energy projects. By respecting this right, CREEs allow indigenous communities to retain control over their energy resources and ensure that any development is in harmony with their traditions, knowledge systems, and long-term goals. This participation ensures that the projects are not only environmentally sustainable but also culturally appropriate and beneficial to the community.

Unfortunately, the FPIC right is hardly respected by authorities and corporations, and the CREEs are hardly suggested either. Legal battles in Canada, such as those surrounding the construction of the Site C dam in British Columbia, illustrate the struggle of the area's indigenous groups – the Doig River, Halfway River, Prophet River and West Moberly First Nations – to assert their rights under treaties and international law (*Prophet River First Nation v. British Columbia*, 2015 BCSC 1682). The Site C dam, part of a broader push towards clean hydroelectric energy, threatens to flood vast areas of land that hold deep cultural and spiritual significance for these communities, as well as being crucial for hunting, fishing, and traditional practices. The area was already threatened by the construction of two dams, which encroached indigenous territories and irreversibly damaged the local biodiversity and over 300 archaeological sites. The constructors, BC Hydro, were accused by indigenous communities, local farmers, and scholars alike of not going through the right steps to have the dam approved and constructed. One of the legal cases pushed forward by local farmers and landowners states that BC Hydro has ignored “key concerns raised by the Joint Review Panel for the project – including cost and the fact that the need for the project had not been demonstrated, while alternatives were left unexplored” (Gillis, 2015). Indigenous groups have also brought forward their own complains, as the construction of the dam not only violates the Treaty 8 signed by Canada and First Nations in 1899 – which include rights to areas used for hunting, fishing, cultural activities and burial grounds – but also international treaties such as the Convention on Wetlands of International Importance especially as Waterfowl Habitat. The company also outright ignored three appeals from the United Nations Committee on the Elimination of Racial

Discrimination to halt the construction of the dam because of serious violations of indigenous and human rights.⁴⁸ It was later discovered that not even geotechnical would stop the construction of the dam, making it clear that it is rather a money issue rather than a wish to produce clean energy (Cox, 2020). Despite the legal battles, which argue that the dam violates indigenous rights, fails to meet the standards of the FPIC right as outlined in UNDRIP, and is on its way to degrade and deal significant damage to the surrounding environment and ecosystems, the project has proceeded, highlighting the limitations of legal protections in the face of green capitalism, and is set to be completed in 2025 and it is unlikely that any judge will order the dam to be dismantled (Gilchrist, 2022). This could, in the future, become a green sacrifice zone.

Similarly, in Alaska, indigenous and local communities have engaged in legal battles over oil and gas drilling in the Arctic National Wildlife Refuge (ANWR). This specific case is not entirely related to sustainability, but rather to the energy sector and the intertwining of green colonialism and capitalism as a guise to provide public goods and services. The ANWR, spanning nearly 19.6 million acres, is a haven for wildlife, including musk oxen, wolves, caribou, and polar bears. Millions of birds from around the world migrate there to breed in the summer. This refuge is also crucial for the Gwich'in and other Indigenous communities who have relied on its resources for generations. The debate over drilling for fossil fuels in this pristine wilderness has continued for decades. However, with the escalating climate crisis, and the melting of land and sea ice, both of which are already damaging the local environment beyond repair, there's growing consensus that drilling for fossil-fuels and all of its externalities is a disastrous idea. Despite the numerous attempts to protect the area by policymakers and politicians alike, the Trump Administration officially opened the area for drilling in 2017. The environmental impact statement produced by the administration is incomplete at best and a way to fasten the process to approve the drilling, ignoring altogether the impact drilling would have on local wildlife and Indigenous communities – ignoring the FRIC right as well. In 2020 1.5 million acres were opened to drilling, commencing the legal battles to protect the ANWR. The first to move forward was the Gwich'in Nation, followed by the Natural Resources Defense Council and other environmental civil societies (*Gwich'in Steering Committee v. Bernhardt, Case No. 3:20-cv-00204-JWS*). They all argued that the government's leasing plan

⁴⁸ “In 2017 and 2019, the CERD called for an immediate halt to construction of Site C. In a November 2020 letter to Canada’s ambassador to the United Nations, made public this month, the Committee once again flagged its ongoing concern over the project and expressed “regret” over Canada’s misinterpretation of its human rights obligations.”
https://www.ubcic.bc.ca/unsafe_in_every_sense_site_c_dam_construction_must_be_immediately_halted

to fuel the drilling violated multiple federal environmental laws and provisions, such as the National Environmental Policy Act, Endangered Species Act, National Wildlife Refuge System Administration Act, Alaska National Interest Lands Conservation Act, and the Agreement on the Conservation of the Porcupine Caribou Herd (Palmer & Greenfield, 2024). In 2021, after the U.S. President Biden put a moratorium on Trump's folly, the Department of Interior formally suspended drilling leases in the ARWR until the finalisation of its environmental review of the leases put forward by the previous administration and, in 2023, the drilling leases were finally erased, and the area is – hopefully – free from threat for the foreseeable future. The legal efforts to halt drilling in ANWR unveil the broader conflict between indigenous rights and state-driven economic agendas, between indigenous rights and green capital-colonialism, between indigenous rights and economic interests.

These legal battles not only challenge the legitimacy of sustainable projects, but also underlines the importance of nature in its entirety. Most legal cases moved forward by Indigenous peoples within the Arctic are to protect the land and all of its inhabitants, animals included.

5.1 What about non-humans? The risk of permanent losses of biodiversity

A less acknowledged issue within the legal battles against infrastructure building, drilling and extracting for energy purposes is the loss of biodiversity. It is a major component of several legal cases, but rarely it is the main focus.⁴⁹ Oftentimes, the word genocide is used to describe atrocities committed during wartimes, and rarely it is used during peacetimes. Yet, said peaceful times have contributed to a seasonal decline of over 76% of flying insects biomass over 27 years of study was lost (Dunlap, 2020). Over thirteen million hectares of forests are lost every year (UN SDG, 2023). Over a million animal and plant species are being threatened with extinction right now, more than ever before (UN SDG, 2019). Dunlap (2020) claims that “genocide, we might argue, is complete once inhabitants perceive a landscape as normal and healthy, yet it is missing inhabitants, life ways and socio-cultural value systems that once lived and were essential to nourishing the health of that place or territory.” Green capitalism puts forward a systematic degradation and eradication of flora and fauna that are inherent to the land and are as important as human beings. He then continues by saying that the word ecocide usually refers to catastrophic – but ‘natural’ – events, and not originating from human interventionism. As seen in the two aforementioned legal cases in British Columbia and Alaska,

⁴⁹ And even rarer are the cases where nature is the plaintiff.

there is a perpetrator and a victim: the latter is the land, its ecosystems, its native inhabitants – human and non – while the perpetrators are “mainly a corporate internationalism which must do everything in its power to discourage ‘unstable’ national movements that disrupt markets and endanger profits” (Davis & Zannis, 1973, p.176). Natural resources are essential to the development of energy projects, which keeps alive the capitalist economy. “*The trees* are killed, the relational qualities of “forests” irreparably severed, damaged, exterminated and reorganised into forest colonies or genetically engineered as ‘flex trees.’ *The rivers* domesticated by dams, ground water usurped by mines and water is fused and contaminated with different chemical compounds by every industrial means of production. *The weather* and ecosystems that absorb dioxin, arsenic, mercury, thorium, radioactive nuclides and other industrial wastes that circulate to alter the composition and genetics of human and nonhuman life. Nonhuman peoples and ‘four legged people’ are systematically executed, displaced and placed into technologically advanced concentration camps or industrial-slaughterhouses for their flesh, fur and organs. Not to forget modernised eugenics programmes branded under the (broad) banner of biotechnology, which we know in Orwellian style as ‘animal testing.’ Degrading or destroying nature reinforces self-degradation and destruction, which is at a scale that concerns genocide [studies]” (Dunlap, 2020, p. 9).

5.2 Cook Inletkeeper et al. v. U.S. Dep’t. of the Interior et al. – Organised Village of Kake et al. v. U.S. Dep’t. of Agriculture et al.

There are two cases to be taken into consideration that deal with irreparable damages dealt to the Alaskan and Arctic biodiversity. The first one, *Cook Inletkeeper et al. v. U.S. Dep’t of the Interior et al.*, involves environmental groups challenging the U.S. Department of the Interior's approval of an oil and gas lease sale in Alaska's Cook Inlet. The plaintiffs argued that the Department of Interior, through the Bureau of Ocean Energy Management, violated federal environmental laws, particularly the National Environmental Policy Act, by failing to adequately assess the environmental impacts of the lease sale on the Cook Inlet's unique marine ecosystem, which includes endangered species like the beluga whale and the sea otters – both protected under the Endangered Species Act. The lease sale would have opened about a million acres of federal waters in Southcentral Alaska to the fossil fuel industry. Furthermore, the plaintiffs claimed that the environmental impact statement prepared by the Bureau of Ocean Energy Management was insufficient and did not properly account for the potential effects of oil spills, increased vessel traffic, and other risks associated with drilling activities. Fortunately, the legal cases reached a positive outcome in 2024: the court ruling criticised the Department

of Interior for failing to adequately assess the impact of the lease sale on beluga whales. The department overlooked the cumulative effects of noise pollution from vessels, which can disrupt the whales' ability to navigate and find food using echolocation. This poses a serious threat to their survival. Cook Inlet is a vital ecosystem that supports a diverse range of activities, including fishing, tourism, and subsistence living for Alaska Native communities (Earthjustice, 2024a). However, this region is facing severe threats from climate change, such as coastal erosion, melting sea ice, and fishery collapse. The proposed oil and gas drilling operations would further exacerbate these problems, jeopardising the health of the ecosystem and the livelihoods of those who depend on it.

The second case – *Organised Village of Kake et al. v. U.S. Dep't. of Agriculture et al.* – also had a positive outcome especially considering the severity of the issue when it was first presented in front of the Court. It is about the decision to exempt the Tongass National Forest in Alaska from the Roadless Rule, a federal regulation that generally prohibits road construction and logging in designated roadless areas of national forests, preserving these areas for wildlife, water quality, and communal enjoyment. The Tongass National Forest is the largest national forest of the United States, and it is found in southeast Alaska, covering an area of 68,000 km². Organised Villages – indigenous communities – along with other environmental and tribal organisations, sued the U.S. Department of Agriculture when it decided to exempt the Tongass from the Roadless Rule in 2003. The plaintiffs argued that this exemption would lead to extensive logging, which would harm the forest's biodiversity, ecological integrity, and would hinder the cultural and subsistence practices of indigenous communities as well. The Tongass' ecosystem is a pristine wilderness of islands, fjords, glaciers, and muskegs. It supports a diverse range of wildlife, including salmon, bears, eagles, squirrels, and deer. These ecosystems are among the most unique and well-preserved in the world. The Organised Villages argued that existing roads are sufficient, and that building more of them would hinder their traditional lifestyles as they depend on roadless areas for hunting, fishing, gathering traditional medicines, and cultural uses. Finally, it also plays a crucial role in capturing carbon emissions, making it a vital asset in the fight against climate change, as it holds more than 40% of the carbon stored by all U.S. national forests – it is therefore essential to protect it for the United States to achieve its climate goals (Earthjustice, 2024b). Once again, the Trump administration overturned protective environmental measures, in this case the Roadless Rule, allowing logging to proceed in areas that include ancient, old-growth forests. It was fortunately overturned during the Biden administration in 2021, when the U.S. Forest Service overturned

the previous decision to weaken the Roadless Rule and decided to implement stricter safeguards for the Tongass National Forest, prohibiting large-scale logging of ancient trees. Recently, the State of Alaska, two companies and a group of business and industry supporters filed three separate lawsuits in September 2023 asking a federal court in Alaska to overturn the aforementioned protections in favour of the exclusion of the Tongass from the Roadless Rule. While the Roadless Rule does prevent road construction and logging, it does not prevent other projects such as hydroelectric infrastructures, utility lines, ore mines, and the construction of federal-aid highways (Earthjustice, 2024c). It is now the inverse situation, where Organised Villages and the Department of Agriculture are being sued – this time by the State of Alaska. It would seem that once again, economic interests are taking precedence over environmental interests, highlighting the ongoing conflicts between federal entities and environmental protection efforts.

6. Conclusion: out of sight, out of mind? Ignoring harmful externalities to advance the Green Agenda

The pursuit of the *Green Agenda*, aimed at combating climate change and transitioning to renewable energy, often carries with it harmful externalities, particularly in the Arctic. This region, home to fragile ecosystems and indigenous communities with deep-rooted cultural ties to the land, has become a focal point of both environmental degradation and legal contention. Indigenous rights, environmental rights, and non-human rights are frequently overlooked or compromised in the drive to exploit the Arctic's resources for 'green' energy projects. As demonstrated by various aforementioned legal battles – ranging from the protection of sacred lands and waters to the preservation of endangered flora and fauna species – there is a troubling pattern of not only sidelining the voices of those most affected by these projects, but outright ignoring them. Indigenous communities often face the dual threats of environmental degradation and cultural erosion, as their rights to Free, Prior, and Informed Consent (FPIC) are either ignored or inadequately respected. Similarly, the unique flora and fauna of the Arctic, which have evolved to thrive in its harsh conditions, are put at risk by the very activities that are supposed to mitigate climate change. In ignoring these harmful externalities, the advancement of green policies risks perpetuating a new form of colonialism, one that cloaks itself in the language of sustainability while continuing to exploit vulnerable regions and peoples: green colonialism. For the green transition, and therefore the Green New Deals, to be truly just and effective, it must incorporate a holistic approach that respects the interconnected

rights of indigenous populations, the environment, and non-human life. Only then can society move towards a future that is both ecologically sustainable and socially equitable, ensuring that the Arctic is preserved not just for its resources, but for the people and ecosystems that have thrived there for millennia.

In this chapter, the focus was mainly on the North American Arctic as there is a longer history of legal battles between the federal entities and the plentiful Indigenous Nations. In Europe, the situation is not too dissimilar, although it is on a smaller scale – but no less important. The European Arctic is home to two main indigenous groups: that of ‘mainland’ Europe, the Sámi, and that of the ‘outermost’ region, the Inuit living in Greenland. Seeing that Greenland rescinded from the European Community treaty in 1985, this thesis will regrettably not consider them, notwithstanding they are burdened with the same issues as many other Arctic Indigenous groups, and the Sámi as well.

6.1 Shortcomings of the EGD in the European Arctic

The European Green Deal represents the European Union’s ambitious roadmap to achieve climate neutrality by 2050, aiming to transform Europe into a leader in sustainable development and renewable energy. However, as showcased previously when talking about the North American Arctic, when this continent-wide initiative is applied to the European Arctic, significant shortcomings emerge. The unique environmental, social, and cultural contexts of the Arctic are often overlooked or inadequately addressed by the EGD, leading to a disconnect between the policy’s goals and the realities on the ground. In the European Arctic, home to fragile ecosystems and indigenous communities with centuries-old traditions, the implementation of the EGD poses complex challenges. While the EGD emphasises renewable energy and sustainable resource use, it frequently fails to account for the specific needs and rights of Arctic indigenous populations, as well as the region’s ecological sensitivities. The following chapter examines the gaps in the green policies implementation within the European Arctic, highlighting how its well-intentioned policies may inadvertently contribute to environmental degradation, cultural disruption, and social inequities in this vital and vulnerable region

Chapter 3. The Sámi in the European Arctic: A Case Study in Colonialism and Human Rights

1. Introduction

Despite its apparent stillness, strengthened by the snowy plains and glacial mountain ridges, the Arctic has a rich history of complex societal structures and is not – and was never – devoid of life. Geographically speaking, there is no agreed definition on the delimitation of the Arctic territory, as it changes alongside the tilting of the Earth. Currently, its delimitation is set at 66°33'50.1" north of the Equator, and that line is called the *Arctic Circle*. This designation should not be taken as a rigid and inflexible border, as the Arctic itself is also made of a *Subarctic* area, which falls between the 55° and 65° latitude north of the Equator (McCannon, 2012, p.10). Characteristics of this region are its tundra and taiga, with the first being in the northernmost part of the Arctic, and the other being in its subarctic counterpart. Both have in common the scarce presence of bountiful flora, with at most lichen, shrubs and moss in the tundra, and sparse forests of birches, junipers, larches and spruces in the taiga (p. 17). Animal species are also limited but have evolved to survive the harsh meteorological conditions and scarcity of nourishment. Birds tend to migrate in the Arctic rather than live there permanently, and those that are autochthonous are not many, with species like snowy owls, gyrfalcons, ravens, puffins, finches, waterfowls, and shorebirds. Mammals, on the other hand, are more numerous within the subarctic, with numbers reaching over three thousand species, but less so within the Arctic circle – with numbers not reaching more than a few dozen (p. 18). Emblematic of the Arctic is its apex predator, the polar bear, followed by wolves, lynxes, foxes, wolverines, cervids, musk oxen, sheep, lemmings, marmots, hares, weasels, and other. Walruses and seals inhabit the coastal areas, and belugas, narwhals and whales inhabit the high seas.

The Arctic is also home to peoples that have withstood and lived alongside its harsh conditions for millennia. While it is difficult to exactly pinpoint when the first communities developed up north, hunter-gatherer communities did reach the Arctic Circle between 40.000 to 28.000 years ago (McCannon, p.28). A characteristic feature of several prehistoric Arctic peoples was their fascination with reindeers: while North Americans did not tame them, Eurasian Arctic peoples did (p. 20). As the latter settled and became more – but not fully – sedentary, they started to domesticate reindeers for transportation, pelts and sustenance. In typical human nature, in one of the earliest archaeological sites found within the European Arctic, scenes of hunting, herding and rituals were carved on stones in what is today called '*Rock Art of Alta*', named after the

town of Alta in Norway. Their origin dates to around 5000 BC, but not much is known about who the *artists* were. What is known is that these ancient communities had many things in common with later Indigenous peoples that settled permanently in the Eurasian Arctic, such as reindeer husbandry and arctolatry (*Figure 3 & 4*).



Figure 3. The world's oldest depiction of a hunting fence. The figure is about 7000 years old. Wikimedia commons



Figure 4. Depiction of three bears and a man holding a spear. It can represent a hunting scene, or a ritualistic scene.

During that time, Germanic tribes migrated and settled in southern Scandinavia, becoming the ancestors of modern-day Danes, Swedes and Norwegians (p. 45). In northern Scandinavia instead, Finno-Ugric speaking groups settled and began to inhabit the European Arctic – and there is a high chance that these people were ancestors of the Sámi, which were known by the Romans as the *Phinnoi* and *Fenni* (p. 46). The populations up north developed differently from the peoples from the south, leading a semi-nomadic life tied to nature and the land. As previously mentioned, these peoples practiced reindeer husbandry and shamanism, and depending on their area of semi-residence, they started to differentiate themselves in ‘sea

Sámi’, ‘mountain Sámi’, and ‘inland Sámi’. The two Scandinavian groups – northern and southern – were aware of each other’s existence, but it was only during the Middle-Ages that a more substantial relationship began. Communities began to settle, and societies were created, nurtured by commerce, religion, and a centralisation of power within said communities. It follows the ascent of Vikings, aggressive colonisers, that reshaped Europe and the north, using Iceland and nearby islands to start an early colonisation of *Vinland*, in the latter case, and in the first case founding *Novgorod* and the earliest Russian State of *Kievan Rus’* (p. 69). The battleground that was Europe in the 900s brought to the rise of the earliest Scandinavian Nations as are known today, which would culminate in the Westphalia Peace Treaty and the consolidation of Nation-States. An inkling that richness could be found further north was also driven by the countless myths, originating from Ancient Civilisations and perpetuated by Vikings and other Scandinavian populations, that had a double nature: the legendary but wild lands of *Thule* and *Hyperborea*, that provided ancient merchants with amber and tin, and *Niflheim* and *Kalevala*, death realms rich in whale oil, ivory, *soft gold* – furs – and fisheries (p. 71). The Far North became a land of conquest, to further and consolidate the control of Nation-States and their borders, where to exploit resources, and to spread the word of Christ. A typical feature of Scandinavian States is their close relationship, with the intertwining and distancing of their thrones times and times again.

Despite the north being inhabited by the Sámi, the Scandinavian Kingdoms declared their ownership of the northern lands and established borders to consolidate their power. Seeing that northern peoples were not considered to be actual part of the southern kingdoms, they had to pay a ‘rent’ – a tax tribute – to the central power since they were using a land that was not theirs (p. 74). The defining of the borders made things also harder for the Sámi, as they were semi-nomadic and would carry on with traditional practices such as reindeer husbandry, which implies a yearly migration towards pastures. State control over the land also implies a greater control over resources: the Middle Ages were also the era where whale and seal hunting began on a larger scale, to a point where many national economies actually depended on it and on its trade. “Jurisdiction over Arctic seas meant added access to whales, sea mammals, trade routes and some of the Atlantic’s most desirable herring- and cod-fishing grounds. [...] Exports of cod, funnelled through the port of Bergen, grew from 400,000 pounds per year in the 1500s to 14 million pounds per year by the mid-1600s. Land-based wealth did not go ignored, either by Copenhagen or Stockholm, where Sweden’s chancellor, Axel Oxenstierna, compared Norrland to ‘a new India’. [...] But amber could be found in the forests, tar from Finnish pines was

indispensable to shipbuilders throughout Europe, and Icelandic mines provided sulphur for the making of gunpowder. Since the 1300s, Sweden, a chief exporter of metals, had been taking copper out of Falun in the Dalarna province, at 60°N; it now aimed for the quantities of ore lying north of the Arctic Circle. With help from Sami guides, Swedish prospectors located huge deposits of iron around the *Malmberget* ('ore mountain') of *Gällivare* and the nearby peaks of *Kiirunavaara* and *Luossavaara*" (p. 94).

Again, the richness of the land did not deter the promulgation of myths about the north, that depicted Sámi as savages, as lesser, as *other* – it reached a point where Sámi shamans, the *noiadi*, were burned at the stake because of their pagan ways. The first schools built to assimilate the Sámi into the southern kingdoms were built in the mid 1600s, and their existence would last for almost 400 hundred years (Corson, 1995). The ascent of Romanticism by the end of the 18th Century also gave a new impetus to the full colonisation and control over the northern lands. Romanticism in Europe is what lead to a surge in Nation building processes, but what does that entail? A Nation, seen through a romantic lens, is not just a mass of land defined by borders, but it is something more, a homeland, where the concepts of brotherhood, equity between men, freedom, common language, and a community of people are at the base of its existence. It is not the divine rights of Kings that make a Nation, but those who inhabit it.⁵⁰ With the end of the Napoleonic Wars, ethnonationalism became rampant across Europe and therefore across the Scandinavian States as well. Citizenship, in the sense of someone who is a part of a whole, became a pressuring issue on the shoulders of minorities within established States.

As always, the resources of the North – fisheries, timber, amber, minerals – were of the utmost importance to the flourishing of the State. A new wave of occupation, or settler colonialism, began anew in the mid to late 1800s, with the establishment of new towns, such as mining towns like Kiruna, in Sweden, or the establishment of new harbours, such as the Norwegian cities of Bodø and Tromsø. The total control over the land and its resources is one of the characteristics of the modern State and is widely recognised as a fundamental law principle still nowadays (UN 1972; 1992). It is not surprising that these ascending States would want to

⁵⁰ This is the essence of Romanticism: Emmanuel Sieyès once said "What is the Third State? Everything. What has it been hitherto in the political order? Nothing. What does it desire to be? Something". The Third State is the population, what Romanticism believed that *made* a Nation. This way of thinking managed to topple down several kingdoms and empires with the ascent of the 1800s Springtime of Nations, which resulted in the creation of most contemporary European States. Romanticism and Nationalism go hand in hand, one could call the second an overzealous form of the first.

exert their control over their own national minorities by implementing State-wide policies on such issues. The way that Scandinavian States decided to exert their control was, as previously mentioned, through forced assimilation and Christianisation – with severe punishments if Sámi deviated from the *norm* – and also a physical occupation, by sending ‘real’ citizens to inhabit the northern lands. Emblematic to this was the Norwegian *fornorsking* – Norwegianisation – a policy that officially started in 1850 and formally ended in 1980 (Minde, 2003).

2. The Colonial implications of the Nation-building process

As previously mentioned, the northern Scandinavian peoples were considered to be *alien* from their southern counterparts, and a strenuous colonisation was the solution to integrate these lands in the Nordic Kingdoms. Colonisation is conduct of peoples and States, which usurp, occupy, and encroach a land for their own uses. Before actual plans of occupying the northern lands, most central governments would encroach the land to usurp resources but would not move to assimilate the Sámi. This changed when the waves of romanticism hit northern Europe, thus creating a new nationalist dogma where a State was comprised of its people, its symbols, its myths, its traditions, and its language – all of which had to be a common denominator between all citizens, where differences were not welcomed, encapsulated within well-defined borders. If an early colonisation was put forward by the Church, it then became institutionalised by central governments in their pursuit to be the first to take control over the north and its resources with what is called settler colonialism. In the mind of State bureaucrats, the subjugation of the Sámi came second to land conquering and control, but was no less important (Lehtola, 2015). Settler colonialism is, by definition, a dynamic relationship between central powers, Indigenous peoples, and the land (Veracini, 2011). Settler colonialism has an end, and that is the total assimilation – the engulfing – of the native to the settler, erasing the native, and making the settler appear native. The drawing of borders was one of the first obstacles to the livelihoods of Sámi people. Borders, Lantto writes, are “man-made political structures established to separate territories, and in the process partitioning populations. [...] they have several functions; they are instruments of state policy and state control, markers of identity, as well as manifestations of discourse in, for example, law and politics. [...] to separate ‘us’ from ‘them’” (2010, pp. 1-3). As aforementioned, Sámi used to be a semi-nomadic population that would migrate seasonally to pursue their livelihoods, mainly reindeer husbandry. Their historical land is called Sápmi, which encompasses the northern half of 4 modern States: Norway, Sweden, Finland and Russia’s Kola Peninsula (*Figure 5*). When the first borders were drawn, States were made but Sámi communities were unmade. They could still practice their

livelihoods and cross the borders without many issues, aside from paying taxes. The institutionalisation of said taxes was emblematic for these States to exert their control on the land, as “the ruler who could claim authority over the Sami could also claim control over the territory they used” (p. 545). Taxes were used as a tool to force Sámi to ‘choose’ a citizenship: while in the beginning it did not matter to whom they paid taxes, as they could cross the borders thanks to the institutionalisation of the Lapp Codicil of 1751, it later became enforced and would imply difficulties in crossing the borders as soon as the relationship between countries worsened.



Figure 5. Map of Sápmi

This happened in 1826, after a treaty was signed between Norway and Russia: the Sámi living in that area had only a few years to choose to which country they ‘belonged’ and would be forbidden from crossing the border to pursue their traditional livelihoods. “Reindeer husbandry was not included in these rights, however, officially prohibiting the Sami from using traditional grazing land in the neighbouring state. After new negotiations, the two states agreed in 1834 to abolish all Sami rights to use resources on the other side of the border, apart from specific fishing rights in Norway for one of the Sami communities whose members had become Russian citizens” (p. 547). After a few years, the Norwegian-Finnish border was also closed to the Sámi, but the reason was different than before: the southern populations sent north to inhabit the land were complaining about an unfair competition, as Sámi were encroaching more land than necessary for reindeer husbandry and were, essentially, fishing too much (p. 547). The Sámi

dimension became progressively smaller and smaller, with accusations coming from settlers, and central governments assimilating them by erasing their identity. If that was not enough, following the line of thought of bureaucrats, a Sámi was someone who practiced reindeer husbandry and reindeer husbandry only: a redefinition of their personhood is also part of colonialism and settler colonialism, cementing their rights on paper but essentially taking everything else away, based on racist assumptions (Össbo, 2023a). The matter of citizenship became increasingly more important year after year, and many Sámi would become Swedish or Finnish citizens since their borders were not closed and could be crossed freely to pursue their traditional livelihoods. Citizenship became thus only a tool. Unfortunately, in 1889 Russia decided to close the Swedish-Finnish border, making the Swedish-Norwegian border the last possible venue for Sámi. As stated before, romanticism and nationalism were running rampant across Europe, influencing “[...] the thinking in the Nordic states, relegating the Sami to a subordinate position in this imagined structure. They were considered inferior to the settlers, and reindeer husbandry was judged to be of less value than agriculture. It was more or less accepted that the Sami would have to vacate land needed for agriculture; nomads could not have the same right to land as settlers” (p. 549). To avoid conflicts between reindeer husbandry and land use for other purposes, various Acts and Conventions were convened, the last of which, in 1972 would imply a loss of over 70% of grazing land for Sámi in Norway (p. 550). The lives of Sámi increasingly worsened over time, until the decision of central governments to pursue a nation-wide policy that aimed at integrating every part of society in what were the new Scandinavian Nation States – from a romantic and nationalist point of view.

As previously mentioned, the *fornorsking* was a Norwegian policy that aimed at educating the entire country to what being a Norwegian citizen meant, again from a romantic and nationalist point of view. Schools became the cornerstones of nation-building processes, involving ethnic Scandinavians and Sámi alike. In the latter case, it did not help that historically the northerners were seen as wild savages, heathens that needed to heed the word of Christ. In 1851 the Norwegian Parliament put forward a specific fund to promote the teaching of Norwegian and the Bible to Sámi. If teachers failed to provide a report of positive outcomes of their teachings, they would receive no wage increase – thus pushing teacher to get as many results as possible to gain more money (Minde, 2003, p. 128). It follows, in 1898, that Sámi teachers or those of dubious ethnic origins were forbidden from teaching as they were not suited to teach the intricacies of the *fornorsking*. Boarding schools were built aplenty in Sápmi, enforcing assimilation by distancing children from their households and traditions. By the turn of the 20th

century, the *fornorsking* became a rather successful paternalistic policy, that was seen as a fundamental welfare policy since it “[...] paves the way for development and progress even for those people” (p. 129).

3. The 20th Century: interwar period and energy production

The development of new *enlightened* and more modern schools of thought, such as positivism, did nothing to improve the condition of the Sámi, if anything it worsened it. The deterioration of the situation on the European continent was not of help either. Nationalism and ethnonationalism were taking Europe by storm, and mixing both of them with positivism and similar movements would only create a degeneration of rationality: Darwinism and eugenics (Cerro, 2017). All the prejudices that central governments had against minorities now had a *scientific* backing. Sámi had been called savages since the early meetings between the two, but now governments were more overt with their biases. A direct quotation of a public official in Norway says as such: “The Lapps have had neither the ability nor the will to use their language as written language. [...] The few individuals who are left of the original Lappish tribe are now so degenerated that there is little hope of any change for the better for them. They are hopeless and belong to Finnmark’s most backward and wretched population, and provide the biggest contingent from these areas to our lunatic asylums and schools for the mentally retarded” (Minde, 2003, p. 131). Norwegians were racially superior, and therefore had the moral duty to civilise the savages – the assimilation was for their own good. As showcase before, the control that central government exerted over the northern population also extended over the land – rich in resources. At first, their control stemmed from a desire to expand their control up to the Arctic Ocean (which is comprised of the Norwegian and Barents Sea), and with it its marine resources, such as fisheries and whale-seal hunting – but later, with the development of new technologies at the turn of the 20th century, central governments were majorly focused on mining, logging, hunting, and a novelty: hydropower.

Compared to mainland Europe, more specifically the overwhelming industrialisation and modernisation that was happening within the German and British Empires, Scandinavian countries were a little behind. Forestry was one of the first Nordic industries to be fully mechanised, followed by the Norwegian invention of the harpoon-gun in 1870, which would revolutionise whale hunting and place Scandinavian countries first in this sector (McCannon, 2012, p. 161). Because of the ever-growing industrialisation, minerals were needed more than ever, and Sweden rapidly took its place as a lead with the plentiful ore mines found in the north.

It was during the establishment of the Kiruna mine that the corporation LKAB was founded – both still active today – and more than a billion tons of iron ore would be excavated there from 1910 to the early 2000s (p. 162). Spitsbergen, the main island of the Svalbard Archipelago, was also in the sights of industrialised countries: despite Norway reclaiming its sovereignty over it, British, Swedish, Russian and American companies would exploit the rich coal mines present on the island (p. 162).

Emblematic is the development of hydropower plants in the Arctic. Technological advancements made possible the construction of several large-scale plants starting from the early 1910s in Sweden (Össbo, 2023b). The Water Act of 1918 can be considered as a natural consequence, taking into consideration that 10% of Swedish land is comprised of water, and that there are over 100.000 lakes (Dill, 1993). The construction of hydropower plants is part of a very large process which entails forced relocation and substantial environmental damages. One of the first dams built in Sweden at the turn of the century was that of Bårjås, which was cut out of a National Park, with the excuse that “[...] the material value of the hydropower dam and the non-profit purpose of the national park were incommensurable: too essentially different to be compatible. This incompatibility was interpreted to the gain of the material aims, and the area of the dam was sliced out of the national park in 1919” (p. 120). To create this large-scale project, many workers moved north, overwhelming and occupying a Sámi settlement that was found near the river. The construction of the hydropower plant also ignored the complaints of the local non-Sámi populace, to the point that a local man sued the hydropower corporation. The impacts of hydropower constructions are of a dual nature: first, there is the construction in and of itself – destroying riverbeds, irreparably changing the landscape, pushing local flora and fauna to the brink of extinction, and pushing indigenous populations to abandon the area as their livelihoods have been irreparably affected by it. Second, large-scale infrastructure is not built in a day, and a complex system has to be constructed around it. Starting from the construction of roads, railways, powerlines, the extraction of coal and other materials to bring to the construction site, to the extraction of the materials to fuel the transportation itself, and finally the construction of villages as well. Resource extraction erased Sámi cultural landscapes and impacted on reindeer herding, fishing and farming. This is an issue that will be recurrent with the advancement of technology and of industrial cities in the north, making it hard for Sámi to enjoy their traditional livelihoods.

The Eurasian Arctic was relatively left alone during World War I, with the only novelty being the creation of a Finnish independent state after the Russian Revolution that began in 1917. On the other hand, after the end of the War the situation changed, with most Arctic countries fighting over boundaries issues. In 1928, the German geographer Richard Hennig observed that “the division of the Arctic world, until now unruled because regarded as entirely worthless, is now in full swing” (p. 195). At that time, much of the region remained classified as *terra nullius*, as its harsh temperatures and remoteness were too inhospitable for enterprising colonisers. Despite some tensions, most of the Arctic’s major sovereignty disputes were either settled or remained relatively stable during the interwar years, avoiding outright conflict. (p. 196). Similarly to the situation prior to World War I, the main sector was logging, followed by mining and energy production, with hunting being less common than before because of the dwindled whale populations in the Arctic (p. 204). Metallurgy became more relevant and more needed. In 1921 Finland would find nickel in the Petsamo region, near the Barents Sea. In the same year, iron mining would reach new highs in Sweden, bolstered by the Malmberget mine near Gällivare and the Luossavaara mine. At the heart of his development was Kiruna, whose workforce grew from 7.400 in 1910 to over 13.000 by 1930. In Norway, zinc and aluminium were extracted from mines north of the Arctic Circle, particularly around Glomfjord – near Bodø – and coal mining operations on Spitsbergen were expanded. Again, the Svalbard Archipelago was being exploited by several countries, with Norwegian miners operating alongside the Soviets, who purchased the Barentsburg mine in 1932. The Swedes also established a major coal mining operation on Spitsbergen, opening the Sveagruva mine near Van Mijenfjord in 1917. As previously mentioned, fishing remained economically important for Arctic countries but less than before: the success of mechanisation, like that of the harpoon-gun, drastically decreased the number of marine mammals, such as whales and seals, but also of land mammals, like polar bears and arctic foxes. Not to be deterred, the Norwegians, having perfected industrial whaling techniques, shifted much of their whaling efforts to the Antarctic during the 1920s and 1930s (p. 204).

The assimilation processes in Scandinavia did not halt before the war, nor during and nor after it. If anything, the Sámi were facing more issues than before: other than being forced to abandon their traditions and customs, they also faced economic discrimination and later in the years, racial discrimination. Assimilation, as previously showcased, implied the replacement of Sámi daily aspects of life with national ones – such as the language, history, culture, customs and more. A Norwegian law that lasted until the 40s stated that to own land, one had to be

fluent in Norwegian (p. 205) – therefore discriminating the Sámi, which had lived in Sápmi for centuries and that needed the land to sustain themselves and their traditional livelihoods. Racial discrimination, on the other hand, was the exacerbation of the aforementioned degeneration of rationality: eugenics. What started from scientific research, became a tool to discriminate those who were ‘others’ in the eyes of the majority. Scientists in Scandinavia began desecrating Sámi burial grounds to steal genetic data to ‘prove’ their inferiority, and this mentality kept worsening steadily, to a point that Sámi women were targets in state-wide mass forced sterilisation. They were seen as part of that group of undesirable people who were a burden on the Nordic welfare state. Sweden’s sterilization program operated from 1934 to 1976, affecting nearly 63.000 individuals (p. 205).

The European Arctic became a World War II battleground, with Germany’s decision to take control of Norway and its coasts, Sweden and Finland mines, and harbours off the coast of Svalbard and Greenland (pp. 226-228). The Arctic Ocean became witness of several patrolling ships and submarines – and this would go on during the Cold War as well. The Arctic Circle was not a periphery anymore, it was the theatre – the centre – of warfare and intelligence operations (p. 240). Those who were disproportionately affected were once again the inhabitants of the high north, humans, animals and plants alike. Aside from the significant amount of pollution generated outside of the Arctic, the continuous and strenuous crossing of ships polluted the waters, and the construction of military bases the soil. Emblematic to this was the American base in Thule, Greenland: to bolster the war efforts, a plan to build bases where nuclear missiles could be easily deployed was put into motion, one of which would hide over 600 nuclear missiles under the ice (p. 242). Geophysical assessments revealed that the ice was too unstable to do so, halting the operations, but an U.S. bomber carrying nuclear warheads crashed near Thule, therefore making the Cold War-like annihilation threat a very likely reality in the Arctic. While no warheads detonated, they did pollute the environment and in a very Cold War-fashion, the inhabitants near Thule were not told anything.⁵¹ Similarly, another event – this time not an incident – caused the detonation of another nuclear warhead, which caused a 7.0 Richter grade earthquake, and ended up killing over 2.000 sea otters in the Sea of Bering, and causing radiation to damage the soil and water (p. 244). The Asian Arctic faced similar damages, with inhabitants of several Siberian areas facing some of the highest health ailments

⁵¹ This is reminiscent of the secrecy used during nuclear tests all over the world, where governments would detonate bombs near inhabited areas without informing nearby inhabitants of the risks of radiations – sometimes using said inhabitants as (clueless) guinea pigs to see how radiation would affect their bodies.

induced by radiations. Nuclear radiations and fallouts spread fast and easily through the Arctic environment, affecting Indigenous groups, Arctic flora and fauna. These despicable tests affected disproportionately indigenous populations, and those who were subjugated by superpowers, by what is today called nuclear colonialism: “Nuclear colonialism is a system of domination through which governments and corporations disproportionately target and devastate indigenous peoples and their lands to maintain the nuclear production process” (Endres, 2009). Scientific research was also directly conducted on Indigenous people of the Arctic. An emblematic case is the U.S. collaboration with the Atomic Energy Commission, and their willingness to feed them ‘vitamins’ that were in reality laced with radioactive materials – to study the effects radiations had on thyroids (p. 246).

As most technological inventions were first military inventions, and later became public ones, satellites were used to study the Arctic and its changing climate, sharing the images with wider audiences: with it being a theatre of the Cold War and becoming more polluted day by day because of it, it is of no surprise that the matters of the Arctic started becoming more central and mainstream. Again, those who were affected the most were the locals and indigenous populations, but this time they were also affected positively. Starting from the 70s, new social movements arose, such as the aforementioned environmental interest which culminated in the Stockholm Conference of 1972. This brought to the attention of wider audience climate change and environmental degradation, bolstered and backed by modern scientific data and satellite pictures. This topic was thoroughly analysed in the first chapter of this thesis, and it brought a positive attention to the indigenous populations of the Arctic – finally taken into consideration in the protection of precious ecosystems. Next to this development is that of animal rights: the above-mentioned killing of 2.000 sea otters was the catalyst for the creation of the acclaimed Greenpeace, who would push forward several battles to the protection of animals and their ecosystems. The extreme hunting that happened on the Arctic coasts and in the Arctic Ocean was raised in many international fora, such as the Stockholm Conference, especially seeing that many species were facing an impending extinction (p. 251). This development has a dual nature: first, the protection of these species is essential to the health of the ecosystems, and even if they did not contribute particularly, they have a right to not be hunted to extinction; it follows that by stopping overhunting by ‘external’ agents, indigenous populations do not have to worry about food being scarce. The other side of the coin is that environmental and animal rights activism do not exclude anyone from their views, and indigenous populations were also

the victims of campaigns: if animal hunting has to be regulated, what about these populations whose lives are intrinsically linked to the consumption of these animals? Many indigenous populations received concessions, but not without receiving contempt from animal rights organisations (p. 252).

Technologies advanced, and mining and logging were no longer the main ways to sustain Scandinavian economies. Out of the 3 peninsular states, Norway was by far the ‘luckiest’: in the 60s, a vast amount of oil and gas were found on its shores, pushing other Arctic States to do the same (p.262). Other fossil fuels were found in the waters surrounding the Svalbard Archipelago, and new ore – zinc, copper, gold, aluminium – mines were found and excavated. Technology also bettered hydroelectric infrastructures, which reached new heights and resulted in the presence of over 2.000 hydroelectric dams in Sweden and 3.600 in Norway.⁵² All this culminated in the advent of lessening dependency of Scandinavian states from foreign energy: as of 2022, energy import rates of European Arctic countries vary between 12% and 45%, with Iceland being the lowest, Sweden 30%, Finland 43% and Denmark 44% (Nordic Statistics Database, 2022). Life is not always plain sailing, especially in the matters concerning the environment and indigenous rights, and the construction of the nth energy infrastructure was met with disdain and protests. In the 60s, Sámi did not have any substantial right, and assimilation was still ongoing – but a fledgling movement was taking over the Arctic political sphere. In 1956 the Sámi Council was founded: a transnational organisation whose aim was to reunite all Sámi to face against discrimination, settler colonialism, and as a way to consolidate their political, social, cultural and economic rights. One of its first battles was the recognition of Sápmi as their rightful land – but were rejected on the claims that since Sámi were nomadic, they never owned any land whatsoever (p. 265). In 1973 in Finland, in 1987 in Norway, and in the 90s in Sweden, analogous governmental acts were passed, trying to concede some rights to the Sámi. This was also the results of the strenuous battles that were fought against the construction of energy infrastructures and the encroaching of traditional Sámi land, and thanks to the advent of modern communication means, their plight reached a wider audience making it not a peripheral issue anymore. These were also the years of the ILO C169, which was unfortunately only signed by Norway and Denmark out of all the Arctic Eurasian states.

⁵² There are over 10.000 dams in Sweden (Energi Företagen, 2024), around 450 in Finland (Isomäki, 2021), and around 3.600 in Norway (Andritz, n.d.).

With the end of the Cold War, a new era of prosperity, peace, and reconciliation was afoot – but not enough: “In 1993, the Sami of Sweden, like their counterparts in Norway and Finland, won the right to form national-level parliaments. In all three cases, though, these bodies possess few substantive responsibilities. [...] Moreover, the governments of all three states, anxious to limit the extent of potential land claims, are loath to acknowledge any more territory than they have to as ancestrally Sami. Sami historians and archaeologists have responded with a crusade to lay claim to as many ancient tombs, settlements and ritual sites as possible, with an eye to proving Sami presence in as large a space, and as far back in time, as they can” (p. 293). Economic prosperity and growth were also abundant, again with hiccups in the Arctic and indigenous communities. Most of the battles fought by indigenous groups are of an autonomous nature, followed by socioeconomic health, which is “[...] sorely lacking throughout the North, despite the steadily widening availability of modern technology and consumer goods. The most straightforward problems are poverty, limited access to services like education and medicine, and the sense of hopelessness brought on by stunted opportunities. [...] But even where material conditions are adequate, Arctic aboriginals are troubled by a more abstract and yet often crippling social and cultural disorientation: they may have gained electricity generators and satellite tv, motorboats and Ski-doods, Gore-Tex and gps, but they have paid with centuries-old customs, mother tongues, traditional skills and lore, and much-missed community bonds” (pp. 293-294).

The Arctic is brimming with resources, and its pristine sceneries are soon to be erased by climate change and environmental degradation. The first two chapters of this thesis showcased how countries are rallying to prevent further damage to spread, yet colonial practices still persist. It is impossible to completely stop climate change, McCannon concludes in his work, but it is possible to limit the deterioration with well-thought instruments, such as local and international actions. “In the end, then, the Arctic’s ecological fate would appear to depend principally on the restraint and self-discipline of individual states and businesses” (p. 304).

4. The Present: Advancing the prosperity of society to the detriment of a few

Climate change mitigation is the subject of several international and regional agreements and treaties, and as showcased, the European Union is very much advanced in terms of policymaking to tackle a further degradation. Two of the European Arctic States, Sweden and Finland, are members of the European Union, while Norway has ratified an agreement with the EU, the European Economic Agreement (EEA), which allows for relevant EU environmental

laws to be applicable in Norway as well. Regardless of this, Scandinavian countries have their own environmental laws and policies, and brand-new Green New Deal plans for the future. Scandinavian countries are at the forefront of the energy transition, one of the major components of green transition plans. As of 2022, Sweden and Finland both produce up to 65% of energy through the use of renewable energy and biofuels, with the rest originating from nuclear and non-renewable sources. Norway, on the other hand, produces up to 48% of its primary energy originating from gasses, another 40% from oil and the remaining from renewable sources. On the other hand, the data from energy consumption is slightly different: a good 65% of Finland energy consumption originates from fossil fuels and non-renewables; Sweden is at about 45%, and Norway 42%. The remaining percentages are energy consumption originating from renewables (Nordic Statistics Database, 2022). Compared to other European countries, the energy transition might not be too harsh on the Scandinavian economy, but there are of course drawbacks. As showcased in the precedent and current chapter, energy infrastructure – be it a renewable source of energy or not – has repercussions on the land and its inhabitants. Even more impactful is the digging for ores, essential for building energy infrastructures and to support the green transition and digitalisation.

Emblematic of the Arctic, and in this case the European Arctic as well, are hydropower infrastructures, wind power fields, and mining. All three are relevant for the green and energy transitions – and all three have severe socio-, economic-, and environmental repercussions. To summarise, socio- and economic repercussions stem from the transition itself. While it is true that it will generate new jobs, it is also true that it will cause job losses, especially for these workers in the fossil fuels sectors. Job losses have many negative repercussions on workers and their families, but the green transition assures that it will be just and fair – therefore putting forward plans to prevent a stagnation in these areas. On the other hand, when taking into consideration Indigenous peoples and the Sámi, the energy and green transition will have repercussions on their livelihoods. For example, research on the installation of wind turbine fields has shown that animals, especially reindeers, will do everything to avoid them (Skarin, 2018). And reindeer husbandry and grazing are an essential part of Sámi livelihoods and traditions, therefore impacting their social and economic lives. This is also linked with the issue of land grabbing, and green colonialism: energy infrastructures require large areas, and most of them happen to be either on Indigenous lands or, in the case of reindeer husbandry, in the way of reindeer migration. The construction of related infrastructures, such as roads,

powerlines, the cutting of trees, all deter traditional livelihoods, and they also have an impact on the environment and nearby ecosystems (see *Gwich'in Steering Committee v. Bernhardt*).

Hydropower infrastructures and dams are no less damaging. Aside from forced relocation, the construction of dams severely damages not only water ecosystems, but also the areas surrounding the bodies of water by affecting “the microclimates of the surrounding areas, disrupting natural temperature fluctuations, ecosystems and habitats. For example, increased evaporation in the region of a large dam changes the moisture concentration of the air, leading to increased heavy rainfall. This deprives the surrounding areas of their traditional rainfall patterns, placing stress on ecosystems and municipalities that depend on those patterns. And it leads to an increased rate of storm surges, which can create more frequent and intense flooding than the dam was designed to handle” (Stahl, 2017). Dams also disrupt flora and fauna, both reliant on bodies of water to survive – which has repercussions on their existence, increasing the possibility of either extinction or forced migration, disrupting the local but also surrounding ecosystems. Needless to say, the construction of these infrastructures requires a great amount of money – and money talks: an example is the previously mentioned (*Prophet River First Nation v. British Columbia*), which disrupted the local ecosystems, the lives of the area’s inhabitants and despite the several complaints, the project will be constructed. Even the warnings of how the geophysical assessments of the area were not up to standard were ignored, making it possible for future infrastructural damages that may cause a catastrophic event. Because of the magnitude of dams, even a small one can negatively affect the environment, and the European Arctic has plenty of them: 10.000 dams in Sweden, around 450 in Finland, and around 3.600 in Norway. Sweden is the country with more dams, and 80% of hydropower installations can be found within Sápmi (Sámiráddi, n.d.). The damages caused by dams is also known and physically evident: the creation of a 30km long reservoir linked to a power plant near Jokkmokk, in Sápmi, created what is referred as the “longest dry bed in Europe” with its 17 km of length back in the 1960s (Vekuvaku, n.d.). In the implementation of these projects, externalities are not always fully contemplated nor comprehended: the constructions of such infrastructures do create more jobs, and probably makes the price of energy cheaper for the nearby households, but as always there are drawbacks, like the aforementioned environmental degradation and the damaging of indigenous land, which compromises their traditional livelihoods.

Last but not least, is the issue related to mining. Ores and minerals are essential to the continuation of the green and energy transition, as they are fundamental components of machineries, infrastructures, vehicles, and more. Minerals are so important that the European Union itself had to compile a document stating the importance of minerals, both for the transitions but also for geopolitical issues, that of the non-reliance on unstable and foreign markets. The Arctic, as it was considered *terra nullius* until a few decades ago, has an untapped potential for exploitation. Arctic governments have dug the ground for centuries, but it is only now that a plethora of minerals and ores are seen as fundamental resources for the advancement of the green and energy transitions. Of course, mining produces negative externalities that are quite harsh: air, soil, and water pollution affect not only nearby inhabitants, flora and fauna but also the workers themselves who are subjected to the inhalation of particulate matters, which will inevitably worsen their health. In the European Arctic, mines, minerals and ores are aplenty. The infamous Kiruna Mine, in Sápmi, is the world's largest underground iron mine (source) and the Kallak mine, an unexploited mine but soon to be exploited by the British mining group Beowulf (Thule, 2024). Similarly to the hydropower plants, 96% of minerals and ores come from northern Sweden, and 10 out of 12 active mines are in Sápmi (Blåheda, 2021). If that was not enough, in 2023 the largest deposit of Rare Earth Elements (REE) in Europe was found in Sweden. REEs are essential components for the manufacturing of technological objects, and the largest deposits are found mainly in China, the U.S.A. and the Russian Federation.⁵³ The REE deposit has been found in Kiruna, the aforementioned iron ore mine. Since minerals are not only needed for the two transitions, but also for economic growth, it seems impossible for these mines to suddenly stop extracting materials – it is more likely that mining will increase in the foreseeable future (Ojala, 2015).

The green and energy transition, while a key aspect to sustainable development, the Green New Deal, and climate change mitigation, can paradoxically affect negatively the enjoyment of human rights and environmental rights. This thesis has shown how Indigenous peoples have been disproportionately affected by the encroaching of their traditional lands to advance projects related to the two transitions – and the Arctic, a land that is already affected by climate change, is being overburdened by resource extraction and energy production, both of which risk worsening the effects of climate change.

⁵³ In 2011, China accounts for the 90% of world production of REE (Goldman Sachs, 2023).

4.1 Sámi Battles: Case Studies

With the development of environmental protection, and therefore environmental law, issues pertaining to this topic became not only more widely known, but also widely persecuted in legal courts (UNEP, 2023a; 2023b). States, governments, and corporations are now being held accountable for their actions. The plethora of international environmental agreements, treaties, and principles do not seem to be fully effective when economic growth and profit are the main takeaways of these destructive projects – first because, as always, money talks, and secondly because as written in the first chapter, most of these agreements are not binding and therefore do not provide a punishment for those who infringe on an agreement. Laws on papers do not automatically translate to laws in action. Emblematic to this is the 2022 Swedish Law, the “Sami Consultation Law” which requires consultation with the national Sámi Parliament or representatives on issues significant to the Sámi people: the case studies will show how this is mainly a law on paper, as it also does not imply a voting or veto power on decisions – but just a consultation power.

In the case of Indigenous peoples, the two most relevant documents are the C169 and the UNDRIP, alongside the FPIC principle. The latter is not only a key requirement in projects involving natural resource extraction and energy infrastructure, but is also crucial for protecting the cultural and environmental heritage of indigenous communities such as the Sámi. The FPIC is encapsulated in Article 7.3 of C169, which calls for governments to work closely with Indigenous peoples to assess the social, cultural, spiritual, and environmental impacts of development initiatives. “[...] The results of these studies shall be considered as fundamental criteria for the implementation of these activities”. Not only that, but it also calls for “[...] the peoples concerned shall have the right to decide their own priorities for the process of development as it affects their lives, beliefs, institutions and spiritual well-being and the lands they occupy or otherwise use, and to exercise control, to the extent possible, over their own economic, social and cultural development. In addition, they shall participate in the formulation, implementation and evaluation of plans and programmes for national and regional development which may affect them directly” (Article 7.1). It follows that States have to cooperate with Indigenous peoples in good faith, to attain the goals that concern them (Article 32). The UNDRIP is not legally binding, and while Norway has ratified the C169, Sweden and Finland did not – but nonetheless most of the provisions contained in both documents stem from customary international law and from already existing human rights documents, like the ICESCR and the ICCPR. UNDRIP’s Article 20.1 is also relevant to the discussion: “Indigenous

peoples have the right to maintain and develop their political, economic and social systems or institutions, to be secure in the enjoyment of their own means of subsistence and development, and to engage freely in all their traditional and other economic activities”. It follows, in the next Article, that “Indigenous peoples have the right, without discrimination, to the improvement of their economic and social conditions” and that States have to cooperate with indigenous people to help them attain said improvements, without hindering them. If, as previously stated, the C169 and UNDRIP provisions stem from already existing documents, there needs not to look too deep: both ICESCR’s and ICCPR’s Articles 1 call for the universal right to enjoy “self-determination. By virtue of that right, they freely determine their political status and freely pursue their economic, social and cultural development”. Another article that pertains to the Sámi and other Indigenous peoples is Article 27 of the ICCPR, which states that “In those States in which ethnic, religious or linguistic minorities exist, persons belonging to such minorities shall not be denied the right, in community with the other members of their group, to enjoy their own culture, to profess and practise their own religion, or to use their own language”. A reinterpretation of all the aforementioned provisions and rights can therefore apply to the case of Sámi, especially when taking into consideration the loss of the ability to practice their traditional livelihoods.

Furthermore, from a European Union perspective, it has been recalled several times how the green and energy transitions have to be *just*. The Just Transition Mechanism (JTM) that was put on the table by the EU states that “[...] is a key tool to ensure that the transition towards a climate-neutral economy happens in a fair way, leaving no one behind” (European Commission, n.d.). A quick glance at the wording used makes it clear that by leaving no one behind, it means from an economic point of view. It is mentioned that the transition might cause socio-economic issues, but it also affirms that it will bring jobs and prosperity. It does not mention how the funding of these projects might cause social degradation to the point that entire communities might have to be relocated (Dunlap & Laratte, 2022; Szpak, 2019). It is, again, the case of the Sámi, who were and still are forced to relocate elsewhere to practice their traditional livelihoods. The Just Transition Mechanism could be bettered by implementing the FPIC right, or something along the lines, not only for Indigenous peoples but also for the European citizens as a whole, as it can improve democratisation, citizen engagement, and trust between citizens and governments – which has been decreasing over time. Climate change exacerbates inequalities, but that does not mean that the environmental damage caused by climate change mitigation itself has to create even more inequalities, from a social and

economic point of view. “Combating climate change may not serve as a justification for violating the Saami rights, in particular their land rights and the right to the maintenance and development of their culture” – therefore environmental protection and economic development must not come at the expense of the Sámi (Szpak, 2019).

The next paragraphs will summarise what has been said in this thesis into concrete case studies.

4.2 Wind Power

Wind power can be seen as one of the faces of renewable energy, often emblematic in a sense. Wind turbines are essential for the generation of energy, and Scandinavian countries have several wind power plants across their lands – and across Sápmi as well. Two cases pertaining to the unjust development of wind power plants are the Fosen and Markbygden fields, in Norway and Sweden respectively. Both Scandinavian countries have several wind turbines on their soil, with Norway having 1.392 as of 2023 (Andreassen, 2023), and Sweden has 5.164 of them as of 2022 (IEA, 2022). The majority of them are found within Sápmi, and are an obstacle to traditional livelihoods and effective environmental protection. Both countries have, within their national laws, provisions to protect – to a certain extent – traditional practices of the Sámi, such as reindeer herding (Lov om reindrift, 2007; Rennäringslag, 1971). However, National authorities have claimed that “[...] the national interest – i.e. combating climate change – takes precedence over the possibility that the new wind farms will damage the reindeer husbandry” (Szpak, 2019). This is also corroborated in Dunlap and Laratte 2022 work *European Green Deal necropolitics*.

The first case, that of Fosen, has somewhat ended on a good note while also highlighting an issue that is similar to that of the (*Prophet River First Nation v. British Columbia*). The main actors are the Sámi, who have denounced the construction of the Fosen Wind Farm – a mega project which comprises of 6 wind farms – since it hinders their rights to practice their traditional livelihoods, protected by Article 27 of the ICCPR. In 2021, the Norwegian Supreme Court ruled that the development of these wind farms violated the Sámi's rights under the aforementioned Article 27, making the license given to build the wind farm invalid. The Court found that the Fosen wind farm severely and negatively impacted reindeer herding by disrupting grazing lands and migration routes, an integral part of Sámi culture and traditional livelihood. Despite the positive outcome, the wind power plant remained in operation, causing ongoing protests and tensions between the Sámi community, the government, and developers.

The Court did not mandate immediate removal, leaving the parties to negotiate a solution. This latter statement is the crux of the matter: what will be done with the wind turbines that are already built? Will they be torn down? Or will they try to reach a compromise with the Sámi herders? The wind turbines are still functioning, and the energy company claims they will try to obtain a new license by considering and implementing consultation processes with local Sámi, implementing therefore the FPIC – if albeit a bit too late. “Fosen Vind believes that consideration for reindeer husbandry can be ensured by a new application with a new impact assessment, where the care of reindeer husbandry is thoroughly reviewed” (Buli, 2021).

The other case study is that of Markbygden. It is not a legal case, but it has a potential to become one, like Fosen. The pretext is very much the same: the project consists of over a thousand wind turbines, surrounded by other infrastructures such as roads, which would require extensive logging, and again, would hinder Sámi traditional livelihoods. The project would encroach over 450 square kilometres of Sápmi and reindeer pastures. Despite the severity of the issue, the project has not only been accepted by the Swedish government – which claims that will serve its national interests – but also the authorities of the project’s company have asserted that when they were looking for an area where to build it, they went looking for “[...] land which few other people were interested in using [...]. This is a very sparsely populated area with good winds where the owners’ interests fit very well with our interests” (Bloomberg News Editors, 2019). As this thesis has attempted to show, the Arctic and Sápmi are not *terra nullius*, and the land in question is not only inhabited and used by Sámi, but it is also home to several ecosystems that have to be protected from capitalistic ventures such as this one. When the issue first arose, the building company stated that there has been an understanding between them and the local communities, but the Sámi have denied ever having been consulted (Szpak, 2019). In this case and in the previous one – and the next too – the FPIC has not been implemented. It is because of this that a point in favour to a possibility of this case to be brought in front of relevant authorities, is the condemnation addressed to Sweden by the United Nations Committee on the Elimination of Racial Discrimination (CERD) in 2018. The CERD has stated that “The Committee is concerned about: (a) the insufficient legislation to fully guarantee the right to free, prior and informed consent, while natural resource extraction, industrial and development projects continue; (b) the insufficient legislation to protect the rights of the Sami people in their traditional lands, [...]” (CERD, 2018, para. 16). The United Nations Human Rights Committee has produced a similar observation in 2016, where it states that it is concerned about the “[...] (d) the difficulties faced by Sami in securing rights over lands and

resources, including the high burden of proof requirements on Sami claimants to demonstrate land ownership and the inability of Sami villages to obtain legal aid under the Legal Aid Act, despite the fact that they are the only legal entities empowered to act as litigants in land disputes in respect of Sami lands and grazing rights” (HRC, 2016, para. 38). As of 2024, the final assessment of the Markbygden project proposal is still undergoing, and its end is rather predictable: if wind power is seen as national interest, and with now the Green New Deal goals to be attained, it is likely that the project will go through its final steps and be approved.

4.3 Mining

The issue with mining is not too dissimilar to that of wind power. The consequences of mining on both environmental and human health were introduced previously when talking about cobalt mining in DRC, but these negative externalities are common to mining in general. Mining often results in environmental degradation by destructing habitats and causing biodiversity loss. Air pollution is another consequence, especially when it pertains to the spreading of particulate matters and thus leading to the acidification of rain. Mining can also cause water pollution, by contaminating local water sources – therefore contributing to diversity loss and also soil degradation. The latter is caused by the removal of large amount of soil to dig underground, destabilising the land to a point that it increases the risks of soil erosion and landslides (Furoida & Susilowati, 2021). This is the case of the Kiruna Mine, in Sweden. It is considered to be the largest underground iron ore mine in the world, and it has been active since a century ago. Kiruna is found in Sápmi, and Sámi rights have been trampled on since its foundation. The mining of raw materials, such as iron, is critical to the development of infrastructure, technologies, and the advancement of the green and energy transition. Again, mining causes cumulative issues that destabilise not only the land, but also its inhabitants. This time, though, it destabilises everyone: in 2004 KLAB, the Swedish colossus, announced that Kiruna was sinking – everyone inhabiting the town had to leave. The sinking is caused by the continuous mining and the degradation of the soil and underground, and it does not seem like it will be stopping anytime soon since KLAB announced they have found the biggest REE deposit in Europe right there in Kiruna. Similarly to the previously mentioned Markbygden case, the Swedish Government has put mining as a national priority, therefore giving the green light for mining to keep going and for the locals to move out of their own town. The proposed new town that will be built south of Kiruna will also further encroach Sámi land. If, a hundred year ago, Sámi were forced to accept settler colonialism in their town, then they had to accept the changing of their traditional reindeer migration routes because of the mining projects, now they

have to give up part of their land and livelihoods again. Kiruna is home to the biggest Sámi community in Sweden, and is surrounded by two large grazing and herding areas. There are divergent opinions on whether the FPIC was employed in this case (Szpak, 2019), but nonetheless the forced relocation of an entire town is a dire consequence of mining that cannot be ignored. The aforementioned UN Human Rights Committee has also commented on the issue by stating that they are concerned over the lack of “[...] (c) the scope of the duty to consult with representatives of the Sami people in connection with extractive and development projects, including those regulated under, for example, the amended Minerals Act” (HRC, 2016, para. 38). It recommends that Sweden should “[...] (c) review existing legislation, policies and practices regulating activities that may have an impact on the rights and interests of the Sami people, including development projects and extractive industries operations, with a view to guaranteeing meaningful consultation with the affected indigenous communities aimed at attempting to obtain their free, prior and informed consent” (para. 39). If minerals are needed for the green and energy transition, and said transition has to be just, there is another matter that impacts the economic lives of Kiruna – including that of Sámi as well. The relocation has been deemed undemocratic and unjust, as the prices offered by KLAB for the relocation to each resident is not enough to buy a house in the current estate market” (Rankin, 2023).

The aforementioned Kallak mine has a similar background. In 2006, the Swedish Government has approved the plan to drill the ground to create a new mine proposed by a British company, Beowulf. Once more, this mine is found in Sápmi and will inevitably disrupt their livelihoods and create environmental degradation. Unlike Kiruna, this one would be an open pit mine, making it easier for negative externalities to pollute the nearby environment. Sámi and the Swedish Society for Nature Conservation have brought to the attention of the Swedish Court the inadmissibility of the project, but it had a negative outcome: “In the long-term perspective, the mining activity that the application for an exploitation concession concerns involves an intrusion for a limited time in land areas used for reindeer husbandry, within a relatively smaller area, with the potential to generate significant socio-economic positive effects, which is considered good management of the area’s resources” (Thule, 2024). The line of the Swedish Government is clear: national interests, growth and profits are more important than indigenous and environmental issues. There is still a last step to be taken before Beowulf is granted mining rights, which will have to be conceded by the Land and Environment Court.

The European Union Critical Raw Materials Act mentions indigenous populations in the body of the measure. Article 7 para. j on the application and recognition declares the following: “for projects with the potential to affect Indigenous peoples, a plan containing measures dedicated to a meaningful consultation of the affected Indigenous peoples about the prevention and minimisation of the adverse impacts on indigenous rights and, where appropriate, fair compensation for those peoples, as well as measures to address the outcomes of the consultation” (Regulation 2024/1252). It also declares that projects should be as mindful of sustainability as possible, taking into consideration externalities such as environmental impacts, socially adverse impacts, by using the respect of human rights and that of Indigenous peoples (Article 6, para. c). From the entering into force of the act, 11th April 2024, these provisions will have to be respected by all Member States – and hopefully prevent what was discussed by this thesis until now.

4.4 Hydropower

Hydropower has already been spoken about in depth, but it needs a few more considerations. As mentioned, the creation of dams to sustain hydropower plants have negative repercussions not only on the environment but also on the surrounding ecosystems: wetlands. Wetlands are essential for reindeer herding, “Unlike mountain reindeer, forest reindeer usually gather on wetlands and nearby forests during chilly nights. They can graze the wetlands all day if the weather is cold enough. Wetlands and the forests that connect them are significant for forest reindeer herding communities since these systems are the foundation of the whole forest reindeer husbandry. Wetlands contain much different vegetation that is grazed from early spring when snow starts to melt, until the snow arrives again. Due to their openness wetlands facilitate gathering and controlling of the herd” (Sámiráddi, 2023). Relevant to this issue is certainly the Ramsar Convention, ratified by all three Scandinavian States. The Ramsar sites in Sápmi provide essential habitats for wildlife, especially migratory birds – and reindeers! – and play a role in maintaining biodiversity. Hydropower alters the flow of rivers, by diverting them and building dams. Altered water levels can either cause flooding or can cause the drying of riverbeds, ultimately affecting the surrounding flora and fauna. Rivers also support migratory patterns of fishes, and a disruption can easily cause a change in their habits that can be detrimental to their survival, such as trout and salmon. Furthermore, the degradation of Ramsar wetlands due to hydropower projects could be seen as a failure to uphold the Convention’s goals of sustainable wetland management and therefore the States can be liable.

Hydropower plants are aplenty in Sápmi, and one specific occurrence was the catalyst for the realisation and consolidation of Sámi rights in Norway in the late 70s. Similarly, in Sweden, in 1962 the state-owned energy company Vattenfall proposed a plan to exploit the Vindel River for hydropower, which would have turned lakes into reservoirs with significantly raised water levels. This project threatened to submerge entire villages, destroy vast forested areas, and disrupt Sámi reindeer herding territories and migration routes, severely altering the river and local ecosystem. However, this event will end on a happier note: thanks to widespread local opposition the plan was eventually scrapped. In 1970 the Swedish Prime Minister declared that the Vindel River would remain undeveloped, and in 1993 it gained protection as a Swedish National River, safeguarding it from future hydropower exploitation. The river and its surrounding areas are now designated as nature reserves, Natura 2000 sites, and Ramsar wetlands, preserving their ecological significance.

5. Conclusion

For a green transition to happen, there needs to be a willingness to make it just. It is evident that corporations and government have jumped at the occasion of deepening their pockets with investments. What is clear is the overzealous need to push investments into the energy and mining sectors, uncaring of the consequences – despite them being not only visible, but also documented and scientifically proven. It is an evident violation of one of the aforementioned environmental principles, enshrined also in the European Union framework: the precautionary principle. Energy projects, but mainly mining projects, provide “[...] short-term jobs and taxes, and long-term environmental and community degradation” (Emel & Krueger, 2003). The encroaching of indigenous land is colonialism, and in this case it is green colonialism. “The green transition industry [...] actually supports and deepens an ongoing colonial wave that started in the fourteenth century and intensified with the discovery of silver ore in the alpine areas on the Swedish side of Sápmi in the 1630s” (Össbo, 2023a). To make it just, not only should the precautionary principle be applied, but also the FPIC should be applied on a wider level, allowing not only Indigenous populations to participate and to decide, but also citizens that will be affected by the transitions’ projects. To make it just, not only economic issues should be considered, but also social and cultural ones. It is harrowing to read the testimonials of those Sámi who were faced with the reality of the situation: that they might not be able to continue practicing their traditions. Here follows the direct citation of Sámi interviewed when asked about their feelings on mining projects that encroach their reindeer grazing lands and traditional migration routes (Blåhed & San Sebastián, 2021).

“They [the mining companies] never cared about any reindeer herders. Not the Swedish state either, [they] never cared. The only thing that has always been done ... is to enable opportunities for oneself. [The Swedish state] have created legislation, and one has been moved from here and there and ... in this way [the Swedish state] has got ... reindeer herders in Sámi to quit and become settlers”

“... you feel a grim hopelessness, you feel, you become depressed, ... [after] you have been to these meetings [with other mine actors] ... and you go to the reindeer forest, and then you see all of that ... then you feel fucking depressed, and you think: ‘am I [going to be] the last generation to do this [reindeer husbandry]?’”

“It puts a lot of negative thoughts in circuit when you start thinking about the consequences, if it happens [if the mine is established], but at the same time we must think that it will not happen and work towards that”

“Everything from feeling that your way of life disappears, to feeling that my job will disappear, my income will disappear, and that . . . the possibility of the children working with reindeers if they want to, that goes away, and . . . just that connection to the place, the mental pressure too—that entails an anxiety, because the nature will go away.”

“It is a lifestyle. It is a life. It is not a job, it is not nine to five, when you close the door, that you ... no, hell no, it is a life. [...] What we love the most is the reindeer. And when we do not have grazing lands, because the mine has possessed it, well, what are we then? Nothing.”

“It was hard getting that yoke put on you like ‘well but, you anti-miners, you are just egoistic, and the reindeer husbandry does not contribute to society’ and . . . those sorts of comments. Like, ‘but you have to understand that for the sake of the future, the sake of Jokkmokk’s future we must have a mine’ but I see it as the opposite: for the sake of Jokkmokk’s future we must not have a mine.”

These feelings of hopelessness, of anger, of anxiety, of depression – psychological repercussions in general are not considered at all within any frameworks that were quoted in this thesis. It is a very serious issue, especially considering that suicide rates among Indigenous

peoples are higher than their settler counterparts (Nsoesie & Yang, 2022). Similar for the Sámi, suicides are higher than their settler counterparts – suicide ideations happen to be four times higher than Swede settlers (Omma, et al., 2013). 76% of the Sámi bodies analysed post-mortem show that they had alcoholism problems – after 2001 all bodies analysed had a high alcohol concentration in their blood (Jacobsson, 2020). The reason for this is rather straightforward. Frøydis Nystad Nilsen, a Sámi psychologist, claims that “We are the nature people [...] When you lose your land, you lose your identity” (Schreiber, 2016). A fellow Sámi psychologist corroborates this by claiming that half of Sámi adults suffer from anxiety and depression (ibidem). Green Deals can become a new form of colonialism, be it green colonialism or settler colonialism, but one thing is certain: the goal of colonialism is to erase what came before, and rewrite history as the conquerors will want to. By encroaching indigenous lands and making it impossible for them to practice not only their traditional livelihoods, but to just *live* – as it is their right, a human right – an even nefarious event might happen, and that is of genocide. Genocide can be defined as a systematic elimination of a *genus*. A genus is a characteristic that is common by a group of people, animals or other things. The 1948 Convention on the Prevention and Punishment of the Crime of Genocide states as such: “In the present Convention, genocide means any of the following acts committed with intent to destroy, in whole or in part, a national, ethnical, racial or religious group, as such: Killing members of the group; Causing serious bodily or mental harm to members of the group; Deliberately inflicting on the group conditions of life calculated to bring about its physical destruction in whole or in part; Imposing measures intended to prevent births within the group; Forcibly transferring children of the group to another group” (art. 2). The Sámi and many other indigenous groups went through as such, and it will be hard to find a State that will admit doing so. Killing members of the group, causing mental harm, deliberately inflicting harsh life conditions that are meant to bring destruction, sterilisation, forced relocation of children – all of these are very common events in the history of Indigenous Peoples. But killing is not the only way to eliminate a *genus*: stripping away its defining characteristics is also one. That is the ratio of settler colonialism, and the policies that are still perpetrated by contemporary governments. If a key characteristic of being Sámi is reindeer herding, by making it very hard – if not impossible – to practice as such, is it not an erasure of their *genus*? By developing in Sápmi, and thus erasing historical landmarks, making it rather Swedish or Norwegian or Finnish land – is it not erasing the *genus*? By creating such a harsh environment that Sámi are forced to abandon their *genus* to survive, even economically speaking, is it not – again – erasure?

Human rights should not be sacrificed nor overstepped in the pursue of a set of policies that declare themselves to be sustainable, just, and for the betterment of the future generations. It would be hypocritical, as it seems that rather than an honest pursuing it looks like a new *gold rush*, where the pioneers are governments, corporations and big companies. The paradox of the green transition is that it is proposed as a policy for the betterment of the whole, but by jeopardising human rights and environmental rights it is clear that it is for the betterment of a few.

Conclusion

This thesis has sought to analyse how green development, despite its positive goal of protecting the environment and mitigating climate change, has severe drawbacks that are often ignored by policymakers and governments alike in the face of profit and economic growth. Said drawbacks have repercussions not only on the landscape, but also on those who inhabit it, such as humans, flora and fauna. Indigenous peoples and minorities are disproportionately affected by climate change, and with the development of infrastructures on indigenous lands, they are now also affected by a perpetuation of a settler colonialism mentality. It does not have to be so, but not many decision makers put into action the instruments necessary to avoid unnecessary conflicts.

The Free, Prior, Informed Consent is an instrument that should be implemented when governmental matters affect Indigenous peoples' lives and territories - but it falls short when, in the eyes of the decision makers, indigenous lands are part of the national territory and not a separate entity that needs more consideration. It is even more difficult to respect Indigenous Rights, as defined by the C169 and UNDRIP, when the first has been ratified by a meagre number of States, and the second is not legally binding. Green development infringes indigenous rights, but if nothing pertaining to it has been ratified, States are not bound to respect it. One might argue that Indigenous Rights are Human Rights, and that is a different matter altogether. Right to life, to private property, to pursue economic development, exercise control over traditions and ways of life - all of these are enshrined in the International Covenant on Civil and Political Rights and International Covenant on Economic, Social and Cultural Rights, and Indigenous people can avail themselves on both Covenants to protect their rights from being infringed.

But, again, it is rather difficult to do so when in the eyes of the States, green development is a national priority - especially when it is bolstered by the European Union and the need to become less dependent on foreign markets. This mindset was introduced in the second chapter, where the need for resource extraction was stressed, and was thoroughly analysed in the third and final chapter. The Sámi have been victims of colonialism in the past, and in the present as well. Their needs, their traditional livelihoods have been overstepped and ignored by the decision makers. Energy infrastructures and mining have vandalised the Arctic landscape, scarring the environment and altering the lives of those who live within it. It is not only a physical scarring,

but also a mental one: Indigenous people in general, and in this case the Sámi as well, suffer psychologically from the damage that is being done to their lands and because of their inability to practise their traditional livelihoods. Depression, anger, anxiety, alcoholism and suicide are more prominent in Indigenous communities than in their settler counterparts. This is one of the gaps in the green transition debate, with the first being the ignoring of harmful extractive externalities, and the second the consequential social effect it has on the lives of people.

The aim of this thesis is not to dismantle or criticise the effect of the European Green Deal or of Green New Deals on a whole, but rather to point out the gaps in the debates that surrounds it, especially when it concerns the matters of resources, which is something that the European Union has already had several issues with - considering the continuous human rights infringements in the contexts of Western Sahara and the Democratic Republic of Congo. Green New Deals, and the European ones, do have a beneficial goal, but might worsen the already delicate situation that is present in the Arctic.

The limitations of this thesis are essentially two: the first is that most of the available data is not available in the English language, and even with the help of modern translators, it is quite hard to extrapolate truthful data. The second is that the aforementioned cases of infringement and of disrespect of the Free, Prior and Informed consent are so called 'bad apples'. Thanks to the existence of several regional instruments, such as the Saami Council and the national Sámi Parliaments, there is an effective participation of Sámi in governmental matters. In the North American Arctic there are organisations such as the Inuit Circumpolar Council that acts similarly to the Saami Council. Of course, they are not maximally effective as their input is only of a consultative nature, but it does include Indigenous people during decision making processes - if their input is respected or not, that is another matter altogether. One bad apple does not spoil the whole crate, but if left unchecked, it may.

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Figure 1. *Time frame of 18 years before and after Stockholm Conference*. Data retrieved from: International Environmental Agreements (IEA). Database Project. Data retrieved from: <https://www.iea.ulaval.ca/en/agreements>

Figure 2. *Figure 2. Time frame of 18 years after the Stockholm Conference, focusing on the amount of BEAs and MEAs*. Data retrieved from: International Environmental Agreements (IEA). Database Project. Data retrieved from: <https://www.iea.ulaval.ca/en/agreements>

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