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The Relationship between Transparency Obligations and Foreign Investment in Renewable Energies: Realising the Potential Role of IIAs

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Abstract: The global deployment of renewable energies has taken off and calls for a continuous increase in foreign investments and cooperation, particularly because many states cannot cover the costs and technological requirements of the energy transition on their own. Therefore, there should be policies and legal frameworks in place to protect and thereby promote foreign investments. International Investment Agreements (IIAs) can, ceteris paribus, contribute to this goal. These agreements contain a set of obligations that protect foreign investments against possible discriminatory or arbitrary conduct of the host states. This includes transparency obligations that can help to create a level playing field for national and foreign renewable energy investors. Unfortunately, the concept of transparency, and its inherent implications, has not been clearly defined to date, and its relationship with renewable energy investments is still under investigation. Therefore, it is important to realise the prevailing transparency obligations under IIAs, and the best practices that can better meet the particular requirements of renewable energy investments. Using a qualitative approach, this article intends to pursue this goal by providing an overview of the concept of transparency, exploring its status in the context of fair and equitable treatment (FET), and analysing favourable transparency clauses in the light of renewable energy investment considerations.

Keywords: arbitration; fair and equitable treatment (FET); international investment agreement (IIA); transparency; renewable energy; feed-in tariff (FIT); government procurements



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1. Introduction

Climate change is considered to be the biggest challenge of the 21st century. The world is already experiencing its effects. The average global temperature is soaring at an unprecedented rate: drought and wildfires occur more frequently; rainfall patterns are shifting; glaciers are melting; and the sea level is rising [1,2]. Greenhouse gas (GHG) emissions, encompassing carbon dioxide, methane, and nitrous oxide, set the Earth on a trajectory towards climate change. These GHGs are generated by the combustion of fossil fuels in industrial, transportation, and agricultural activities [3]. In contrast to fossil fuels, renewable energies emit minimal to no carbon dioxide, making them key contributors to climate change mitigation efforts [4]. Therefore, renewable energy is widely regarded as a fundamental component in the global shift towards a green, low-carbon, sustainable economy [5].

Against this backdrop, an increasing number of states and international organisations are spearheading initiatives aimed at advancing renewable energies as a solution to the world's energy crisis and environmental challenges [6–8]. Among the most notable examples is China's main international cooperation and economic strategy, known as the Belt and Road Initiative (BRI), which has become a broad framework for several Chinese green

development policies, including the construction of renewable energy projects around the world [9].

However, the global deployment of renewable energies entails significant costs, amounting to billions of dollars, which can only be recouped over the long term [10,11]. Consequently, not all states can afford the financial and technological requirements necessary for the transition to renewable energy. For instance, while China dominates today's global photovoltaic (PV) production, most south and southeast Asian countries have a modest share, let alone the least-developed countries [8]. There are, therefore, still many developing countries and some emerging economies that need to adopt favourable regulations and policies to further attract foreign investments in their renewable energy sectors [12].

International Investment Agreements (IIAs) have a potential role to play in this context, as they can help ensure fairness between foreign investors and host states while reducing the risks associated with investment and trade in this sector [13]. In this way, there is a growing need to incorporate an additional normative layer into the investment law system, aimed at aligning existing obligations with climate stabilisation goals and providing proactive protection for foreign investments in renewable energies [14].

Unfortunately, there remain several concerns about the content of IIAs, as they pay little attention to the protection, and thereby, promotion of foreign investments in renewable energies. Most IIAs provide no explicit mention of the term “renewable energy” whatsoever. They often provide a mixture of binding and non-binding obligations with direct and indirect effects [15,16]. Transparency clauses are among these. These provisions are emerging with greater frequency in IIAs and contribute, *inter alia*, to modernising and fostering the legitimacy of these instruments [17–19].

Interestingly, transparency obligations are significant for renewable energy investment promotion, since foreign investors in this sector often assess the regulatory and political risks associated with their projects [17,20,21]; to date, non-transparent and arbitrary conducts have been perceived as major legal obstacles to the promotion of foreign investments in this sector [22,23]. While a non-transparent investment environment may raise information costs, divert corporate efficiency, and create other financial crises, a transparent atmosphere helps attract more foreign investments, *inter alia*, through the dissemination of information on investment opportunities in the host state [24–26]. Therefore, it is an important factor for the private sector, as it enhances competitiveness, and its absence makes them feel ostracised [27]. Likewise, international organisations now put an increasing emphasis on the need to adopt transparent and well-formulated laws as a type of “policy de-risking” to create a favourable investment environment for the deployment of renewable energy projects [22,23,28], and as a means to give industry the confidence to invest [29].

Although transparency concerns arise both in the context of national legislation and investment agreements [30], IIAs are themselves a reflection of national legislation [31]. In this way, IIAs that contain comprehensive transparency clauses in favour of foreign investors, *per se*, serve as a signal that the host state has laws and policies in place that protect foreign investments [31,32].

It is important to mention at this point that domestic legal systems are increasingly establishing transparency regulations, for example, through freedom of information acts and lobbying regulations [33,34]. However, incorporating transparency obligations in IIAs is significant since, in contrast to national laws and legislation, such treaty provisions are usually backed by direct investor–state arbitration that allows investors to bypass local remedies and take the dispute directly to international arbitration [35,36]. Moreover, IIAs can make countries' legal frameworks much more transparent, because in many countries, such international commitments are considered above the national legislation [37]. Therefore, it is important to include transparency clauses in IIAs to protect renewable energy investments against possible non-transparent regulations and potential political risks. This goal will come true by using well-established principles of international investment law while observing the particular features of renewable energy investments [31].

To date, international investment law has generally received little attention from sector-specific analyses compared to other sub-systems of international law such as international trade law [38].

This is particularly the case for the legal relationship between transparency obligations and foreign investments in renewable energies. Much of the existing literature highlights the positive effects of transparency obligations on the development of the renewable energy sector. For instance, Mendonça et al. have analysed three factors of stability, participation, and transparency in renewable energy policy with a special focus on Denmark and the United States [39]. Similarly, Guo and his colleagues have expounded on the impact of institutional transparency of recipient countries on the promotion of renewable energy in sub-Saharan African countries [40]. Another notable example is the recent research conducted by Fajar Fadli (2021), who examined renewable energy governance in Indonesia and has tried to establish a link between transparency and participation in this regard [41]. However, the ways in which the relationship between transparency obligations and the matter of foreign investment in renewable energies have typically been approached in the literature are limited by geographical boundaries and/or national legislation points of view. Additionally, most studies have focused on certain aspects of renewable energy development, and not necessarily on the promotion of foreign investments in this sector. As a result, a comprehensive approach to the legal status and nature of transparency obligations, the way they are incorporated in IIAs, and their relationship with renewable energy investments are often overlooked. This brings us to the main question of this article: How can transparency obligations under IIAs better address the unique requirements and challenges of renewable energy investments?

To answer this question, this research employs a descriptive and qualitative research methodology. Using a descriptive method, it aims to provide a comprehensive understanding of transparency obligations and their determinants. Adopting a deductive approach to qualitative content analysis, this article conducts a thematic analysis of the transparency obligations within IIAs. It deduces the outcomes of such clauses for renewable energy investments in the light of prevailing concerns and potential solutions. The hypothesis posits that incorporating tailored transparency clauses into IIAs can, *ceteris paribus*, help to create a level playing field for foreign investors in the renewable energy sector. This can protect them against discriminatory and/or anticompetitive practices of the host states, inform them about investment opportunities, and also enhance investment and information security.

For this purpose, we have scanned and utilised more than 140 primary and secondary sources, including books, journal articles, research papers, reports, new publications, etc.

This article begins in Part Two by providing an overview of the concept of Transparency and its relevance to foreign investments. Part Three analyses the incorporation of transparency obligations under the umbrella concept of fair and equitable treatment (FET), a significant issue given that many IIAs lack independent transparency clauses. This section references relevant arbitral awards and highlights preferable arbitral approaches. In Part Four, we examine transparency clauses in recent IIAs and discuss the most favourable clauses in the context of renewable energy investment concerns.

Finally, the article concludes that transparency obligations have far-reaching impacts on foreign investors' rights and returns. However, most IIAs suffer from the lack of adequate transparency clauses. While there is an evolving approach among states to transparency and its implications, IIAs need to align with growing transparency concerns, particularly in renewable energy projects.

2. The Concept of Transparency

Today, transparency in economic and investment decisions stands as one of the widely discussed topics across economics, investment, and legal scholarship [37]. Although transparency obligations may be of particular concern to both the host states and foreign investors, for investment promotion purposes, they are primarily viewed from the perspec-

tive of foreign investors. Often, investors and businessmen prefer to have full access to information in the host state that may influence the investment environment and affect their fair returns [26]. They are well-aware that access to information may be restricted or costly, and that investment policies vary from one country to another [37].

However, defining the concept of transparency and its boundaries is not an easy task. As Bianchi noted in *Transparency in International Law*, “Not even the one NGO that is expressly devoted to transparency issues provides a general definition of transparency” [42]. To date, transparency remains to be a difficult term to define, lacking a commonly accepted abstract definition; hence, it may mean different things to different people and organisations [43]. For example, the Organisation for Economic Co-operation and Development (OECD) defines transparency as the result of “successful two-way communication about policy between governments and other interested parties” [44]. The same approach appears to have been endorsed by the United Nations Conference on Trade and Development (UNCTAD) [43,45]. It appears that an understanding of transparency and the scope of this concept are still evolving. However, transparency obligations can facilitate the participation of investors and attract more investments, as they often support the legitimacy and accountability of actors and norms operating in the investment environment [30,37]. Moreover, it is seen as an indication of the concept of “good investment governance” [26,33]. As was rightly stated by the tribunal in *Tecmed SA v Mexico*:

The foreign investor expects the host State to act in a consistent manner, free from ambiguity and totally transparently in its relations with the foreign investor, so that it may know beforehand any and all rules and regulations that will govern its investments, as well as the goals of the relevant policies and administrative practices or directives, to be able to plan its investment and comply with such regulations [46].

Therefore, countries with transparent trade and investment frameworks tend to attract more foreign investments compared to those burdened with bureaucratic inefficiencies and plagued by corruption and its related challenges. Foreign investors are less inclined to engage in business in countries lacking transparency due to heightened risks, uncertainties, and associated costs [37].

It is essential to recall that the lack of transparency has been linked to several financial crises, including those experienced by Mexico in 1994–1995 and later by the Asian economies in 1997–1998. Hence, it is now widely acknowledged that the availability of timely and comprehensive information, enhanced supervision and regulation, paired with transparency in financial systems, are crucial to averting financial market instability [37,47].

Against this background, various states and international organisations have realised the need for a liberal, transparent, and coherent international investment regime. For instance, the WTO has confirmed the need to create a “framework to secure transparent, stable and predictable conditions for long-term cross border investment, particularly foreign direct investment that will contribute to the expansion of trade, and the need for enhanced technical assistance and capacity-building in this area . . .” [48].

Generally, transparency concerns arise in the context of national policies and legislation, as well as IIAs [30]. However, since neither laws nor IIAs provide an exhaustive list of transparency obligations for host states, it is crucial for negotiators, commentators, and arbitrators to adopt a broader interpretation and application of transparency to prevent host states and their subsidiaries or entities from abusing their obligations towards foreign investments.

3. Transparency as a Component of Fair and Equitable Treatment (FET)

The FET stands as the most frequently invoked standard of protection and holds paramount practical significance in renewable energy investment disputes [49,50]. Although FET follows a similar pattern in most IIAs, it lacks a common standard architecture, and there is still the question of what constitutes fair and equitable treatment [51,52]. Therefore, there is uncertainty about the scope of protection afforded by this standard [31]. In fact,

it is not clear whether FET is confined to the scope of the minimum standard of treatment in international law (international customary law) or provides a more inclusive umbrella of protection [51,53–56]. The confusion is heightened by the fact that certain IIAs encompass both FET and Full Protection and Security (FPS) standards under the umbrella of the minimum standard of treatment [57,58]. In addition, the content of legitimate expectations, as the “dominant element” of FET, is not clearly defined and may vary according to the IIAs, national legislation, unilateral acts, and other formal and informal representations made to investors [59–63]. The uncertainty surrounding the issue of legitimate expectations further complicates the ambiguity of this standard, especially considering that protecting investors’ legitimate expectations is considered the “most important function” of FET [59,60].

Against this background, the scope of FET is sometimes interpreted as overlapping, or in combination with, other treaty provisions, including FPS, non-discrimination, protection against expropriation, etc. [61,64–66]. In this way, FET claims are similar to catch-all claims that are likely to succeed when other treaty claims fail [67]. Transparency is no exception, and it is generally agreed that it plays a key role in defining the scope of FET. Today, an increasing number of tribunals accept the states’ responsibility to act in a transparent manner based on FET [46,54,61,68,69]. As held by the Tribunal in *Metalclad v Mexico*:

All relevant legal requirements for the purpose of initiating, completing and successfully operating investments made, or intended to be made, [...] should be capable of being readily known to all affected investors of another Party. There should be no room for doubt or uncertainty on such matters [...] so that investors can proceed with all appropriate expedition in the confident belief that they are acting in accordance with all relevant laws [70].

Such broad approaches can serve the interests of foreign investors in various economic sectors, including renewable energies, to an extent that the host states redefine their priorities and functions of administrative agencies as de facto insurers for the implementation of foreign investment projects [33].

However, uncertainty remains as to the existence of the obligation of transparency under customary law [71]. To date, customary international law is quite underdeveloped with regard to the transparency of governmental information and administrative decisions [33]. As Schefer has rightly stated in her recent theory of “Strong Responsibility to Protect (R2P*)”, which supports climate-friendly activities and the promotion of renewable energies, FET protections should extend beyond the minimum standard of treatment, and, more promisingly: “They may also extend beyond what is generally viewed as the level of treatment expected under autonomous standards—behaviors that are non-arbitrariness, non-discriminatory, intransparent, taken in bad faith, or against the investor’s legitimate expectations” [14]. Thus, FET could be a vehicle to address modern renewable energy investment requirements.

Frustratingly, investment tribunals hold divergent views on whether transparency obligations can be imposed based on customary law. Some argue that transparency may only be inferred from an applicable FET clause [72], while others consider customary law a sufficient legal basis for transparency obligations [73]. Therefore, the interpretations of the scope of FET have been inconsistent and sometimes contradictory in this regard. As a result, investment tribunals have yet to come up with a relatively consistent approach to the boundaries of this standard, to provide predictability and confidence to prospective renewable energy investors.

It is important to note at this point that approximately 10% of IIAs do not include FET clauses [16,63]. Moreover, it is estimated that FET claims have had a success rate of only around 37% for foreign investors in arbitration cases [74]. On the other hand, transparency itself remains a challenging issue in international investment law, and defining its proper scope and boundaries, including the protection of privacy, commercial confidentiality, and national security interests, proves to be a complex task [33,75]. Consequently, investment tribunals may establish varying degrees of transparency, even under applicable FET

clauses [70,71,76]. This can cause additional inconsistencies in arbitral awards, even when concerning similar or identical disputes.

To address these challenges, a new generation of IIAs has emerged, incorporating innovative FET clauses that expressly include an obligation of transparency [71,77–79]. For example, as per the Netherlands Model Bilateral Investment Agreement (2019), a contracting party breaches the fair and equitable treatment obligation where a measure or series of measures constitutes a “Fundamental breach of due process, including a fundamental breach of transparency, in judicial and administrative proceedings” [80]. Interestingly, it further obliges the parties to cooperate in reviewing the content of FET, and to “complement this list through a joint interpretative declaration” [80]. To bring more consistency to arbitral practice, it also calls upon the tribunals to take into account all the legitimate expectations arising out of representations made by the host state, and its contracts [80]. It is a preferable FET clause, as it can avoid ambiguities concerning the obligation of transparency on the part of the host states and thereby contributes to enhancing the consistency of arbitral decisions concerning the protective scope of FET in this regard. This is a significant task, as consistency is an often cited, and elusive aspect, of international investment law [81]. It enhances the certainty and predictability that are crucial elements to the promotion of foreign investments [82–84]. This is particularly appropriate because the unpredictability of laws and the lack of clear commitments play a major role in making foreign investors reluctant to invest in long-term projects, which is the bane of BOT investments, especially in the renewable energy sector [31,43,85].

4. Transparency Obligations under IIAs and Renewable Energy Investment Concerns

Transparency concerns have intermittently arisen in relation to renewable energy projects and have impacted the inflow of foreign investments. Among recent examples are the *Belo Monte* project and transmission line auctions, which all depicted a lack of transparency in the decision-making and administration of power projects in Brazil [86,87]. This led the government to undertake a set of reforms including the expansion of a free electricity market, the separation of products in a regulated electricity market, higher maximum tariffs, and a transparent tariff revision formula that have in turn encouraged BTG Pactual and other investors to invest in this sector [22,88].

Another significant instance illustrating this impact can be observed in the recent *Inga-3 Basse Chute (BC)* and Mid-Size Hydropower Development Technical Assistance (TA) project in the Democratic Republic of Congo (DRC). The World Bank’s Board approved a \$73.1 million grant from its International Development Association (IDA) for constructing a dam and a 4800 MW hydroelectric plant at Inga Falls on the Congo River. However, following the host state’s decision to alter the project’s strategic direction, diverging from the agreement reached between the World Bank and the government in 2014, the World Bank Group suspended disbursements to the project after covering approximately 6% of the total project financing [89]. The suspension stemmed from the World Bank’s objection to the new process, which lacked transparency and accountability, particularly because these shortcomings posed a significant risk of fund mismanagement for the project and potential reputational risks for the World Bank [90,91]. As is rightly stated by the tribunal in *Thunderbird v Mexico*:

In case of doubt, the risk of ambiguity of a governmental assurance is allocated rather to the government than to a foreign investor and that the government is held to high standards of transparency and responsibility for the clarity and consistency in its interaction with foreign Investors. If official communications cause, visibly and clearly, confusion or misunderstanding with the foreign investor, then the government is responsible for pro-actively clarifying its position [92].

To date, there have also been a handful of investor–state arbitrations in the renewable energy sector where transparency issues have been central to the disputes. A notable example is *Eiser Infrastructure Limited v Spain*, which involved investors challenging Spain’s regulatory changes affecting solar photovoltaic (solar PV) projects. Transparency con-

cerns centred around the retroactive nature of the host state's regulatory changes and the lack of clarity in its regulatory frameworks, impacting the stability and predictability of investments [93].

All these cases underscore the importance of transparency in promoting foreign investments in renewable energy across different countries [90].

It is interesting to know that IIAs may be in the service of transparency and are themselves the result of transparency at the national level. In other words, states may hesitate to include comprehensive transparency obligations in their IIAs because of apprehensions around the ability of a government to implement such obligations, and to preserve greater policy flexibility while avoiding exposure to investor claims [31]. Nonetheless, foreign investors, especially those engaged in long-term, capital-intensive projects in regulated sectors like renewable energy, frequently evaluate the regulatory and political risks tied to their investments. This assessment includes anticipating potential non-transparent or arbitrary conducts, as such risks can impact their expected returns [17,20,21,94,95]. Therefore, in order to alleviate such concerns, it is important that IIAs incorporate tailor-made clauses that guarantee a certain degree of transparency in favour of foreign investors [31]. In this way, they can serve as a signal that the host state has laws and policies in place to protect foreign investments [31,32].

Transparency clauses were seldom used in older agreements; however, in recent years, a growing number of IIAs have adopted provisions to deal with this issue [17,19]. One of the primary formulations of transparency clauses relates to the publication of policies and regulations on foreign investment. An example is Article 10 of the Model Text for the Indian Bilateral Investment Treaty, which stipulates: "Each Party shall, as provided for in its laws and regulations: (i) publish any such measure that it proposes to adopt; and (ii) provide interested persons and the other Party a reasonable opportunity to comment on such proposed measures" [96].

Interestingly, some agreements contain explicit transparency obligations under both FET clauses and in independent clauses. For instance, the recent BIT between Hungary and UAE considers any "fundamental breach of transparency [...] in judicial and administrative proceeding" as a measure that constitutes the breach of FET, while incorporating a distinct Article on transparency which, *inter alia*, obliges both the central governments and their sub-federal levels to publish the regulations of general application to any matter covered by the Agreement in their official gazette well before the entry into force of such regulations [97,98].

It is important to mention at this point that, should an applicable IIA have no FET clause or a transparency obligation as such, it is possible to import transparency obligations, either as an independent clause or as a component of FET, by resorting to a Most Favoured Nation Treatment (MFN) clause in the applicable agreement [67]. Thus, the foreign investors may equally benefit from the protections offered by other investment agreements signed by the host state, since MFN clauses can multilateralise the substantive protections under other investment treaties signed by the host states [99,100].

However, the renewable energy sector has specific features that necessitate particular protections and transparent endeavours of state parties. For instance, due to policy inconsistencies, the uncertainties about the future returns of renewable energy research and development are often high. Foreign investments for research and development (R and D) in this sector is significant, since many economic markets do intermittently fail when it comes to determining the socially and environmentally viable resources aimed at generating new renewable energy projects [101]. Similarly, many private firms do not have the financial and technological abilities to conduct an efficient level of R and D activities on their own [102]. To facilitate cooperation in this field, IIAs may call upon the parties to "exchange information on investment opportunities" and "on laws, regulations, and administrative practices" to establish a favourable climate for investment [103]. Interestingly, China–Kuwait BIT, for instance, has not only asked the parties to consult between themselves concerning investment opportunities but also requires them "to determine

where investments from one Contracting State into the other may be most beneficial in the interest of both Contracting States” [104].

Today, it is well-established that foreign investors are highly concerned with the confidentiality and privacy of their personal and financial information [24,83]. Given the international community’s challenges over emerging global warming and climate change threats, there are increasing attempts to accelerate research and innovation in the renewable energy sector. As a result, between 2017 and 2019, the sector experienced about a 28% growth of renewable energy patents filed worldwide. The growth of R and D in the renewable energy sector has exacerbated investors’ concerns about intellectual property rights in this sector [105,106]. Therefore, it is crucial for IIAs to provide protection for intellectual properties as a form of investment, thereby supporting cross-border research and exploration in renewable energies. Some IIAs have begun to address the need to protect intellectual property rights in a transparent manner [107,108]. Interestingly, there are a few agreements that give unprecedented importance to this protection. Notably, the Japan–Mongolia EPA has established a special Sub-Committee on Intellectual Property assigned with a range of duties, including:

- (a) reviewing and monitoring the implementation and operation of this chapter [Intellectual Property];
- (b) discussing any issues related to intellectual property with a view to enhancing protection of intellectual property [. . .];
- (c) reporting the findings and the outcome of discussions of the Sub-Committee to the Joint Committee; [. . .] [109].

Such treaty provisions would significantly enhance the protection of intellectual property rights within the renewable energy sector. This is crucial because, in addition to patents, many renewable energy companies are increasingly concerned with the protection of growing trade secrets and confidential information about the materials used, relevant hardware, and the manner they are manufactured and deployed [110,111]. This is particularly due to the fact that, renewable energy projects are increasingly exposed to various threats including cyber-attacks [112–114]. These attacks may cause the leakage of sensitive commercial information [115]. Therefore, it is critical to prevent such attacks and identify, detect and respond to the perpetrators. Governments need to cooperate and share information in this field particularly because not all states have the financial and technological means to protect investment projects against these emerging threats [116]. On the other hand, no international convention has been adopted to comprehensively deal with different aspects of cyber security [117], and the efforts made by the international community have not yielded the expected results in bringing security to this mess [118–122].

It is promising to know that an increasing number of states are dealing with these concerns by incorporating adequate clauses into their IIAs [16]. For instance, the Trade and Cooperation Agreement between the UK and Moldova requests the parties to “cooperate on preventing and combating all forms of criminal and illegal activities”, including fraud and cybercrime [123,124]. Similarly, the United States–Mexico–Canada Agreement (USMCA) obliges the parties to:

- (a) build the capabilities of their respective national entities responsible for cybersecurity incident response;
- (b) strengthen existing collaboration mechanisms for cooperating to identify and mitigate malicious intrusions or dissemination of malicious code that affect electronic networks, and use those mechanisms to swiftly address cybersecurity incidents, as well as for the sharing of information for awareness and best practices [125].

It also calls upon the parties to “endeavour to employ, and encourage enterprises within its jurisdiction to use, risk-based approaches that rely on consensus-based standards and risk management best practices to identify and protect against cyber security risks and to detect, respond to, and recover from cyber security events” [126].

While such provisions are often found in soft law, they are promising, as arbitral tribunals generally interpret agreement provisions “in good faith in accordance with the ordinary meaning to be given to the terms of the treaty in their context . . .”, and the term “context” refers to the entire text of an agreement. Furthermore, these soft law provisions clearly indicate the parties’ intentions to provide the covered investment projects with security against cyber-attacks [127].

Another specific feature of renewable energy projects is that they are often carried out in tandem with national and regional programmes, including feed-in tariffs (FITs), feed-in premiums, quota obligations, tax exemptions, investment grants, etc., [128]. This is due to the intrinsic characteristics of this sector that call for providing a long-term fixed level of support that mitigates the risks of foreign investments and guarantees the investors a fair return on their investments. For instance, FITs that are classified as government procurements are among the principal driving forces in the worldwide development of solar PV [129,130]; as of now, more than 110 countries have enacted FIT schemes [131]. Generally, foreign investors, including international infrastructure providers, are very sensitive to these agreements, particularly since total annual spending in this area is estimated to be around \$4733 billion in OECD countries alone; meanwhile, the area of government procurements generally remains beyond the surveillance of most international investment and trade law agreements [130]. Many IIAs have totally excluded government procurements [132], and others merely contain a commitment to hold negotiations on a set of potential commitments in this regard [133].

Therefore, it is crucial to not create a monopoly and to make a fair distribution of information and opportunities for all investors [134]. To alleviate such concerns, some agreements invite parties to “cooperate to develop conditions for open and competitive award of public procurement contracts in particular through calls for tenders” [135,136].

It is important to note at this point that a growing number of IIAs are introducing innovative mechanisms to address similar transparency issues and create more transparent conditions for investors from both parties [45]. For example, Article 18.1 of the DR-CAFTA-USA Free Trade Agreement requires the parties to designate “a contact point to facilitate communications between the Parties on any matter covered by this Agreement” [137,138].

It appears that the Energy Charter Treaty (ECT) was among the first IIAs to establish such a mechanism for exchanging information between investors and host states [139]. Article 20.3 of the ECT reads as follows:

Each Contracting Party shall designate one or more enquiry points to which requests for information about the above mentioned laws, regulations, judicial decisions and administrative rulings may be addressed and shall communicate promptly such designation to the Secretariat which shall make it available on request.

Generally, establishing “contact” or “enquiry” points reduces costs for foreign investors and facilitates their investments. These mechanisms are designed to clarify government rules and procedures, allowing investors to access public consultations and receive timely and reliable information about laws and regulations. Additionally, foreign investors can overcome their possible disadvantages, such as language barriers or limited knowledge of local institutions, by utilising these institutional arrangements [45]. These factors contribute to creating an attractive investment climate for power projects, which are often located in various geographical areas, both near and far [140]. Furthermore, in some cases, contact points may enable foreign investors to gain direct access to the decision-making processes through special advisory bodies or other official consultation procedures [45,141].

Renewable energy investors’ concerns are also exacerbated by the fact that there is often considerable state involvement, as the owner of either the national resources or critical infrastructure (e.g., power generating or transmission facilities) in this sector [53]. As a result, many renewable energy investment contracts are concluded between foreign investors and state-owned companies or other state subsidiaries [142,143]. Frustratingly, some of these entities do not have a positive credit rating [142]. Therefore, the applicable IIAs need to address transparency issues in investment and trade relationships to pre-

vent arbitrary and/or corrupt practices. In addition to the DR-CAFTA [144], perhaps the most notable example is the Republic of Korea–Cambodia FTA, which not only requires the parties to establish contact points on various issues, including technical regulations, conformity assessment procedures, trade in goods, trade remedies, customs procedures, work programmes, and communications, but also calls for increased cooperation in promoting transparency and combating corruption [145]. Today, renewable energy investment opportunities must be safeguarded against unregulated and abusive lobbying practices, particularly in many developing countries where governments are under pressure to maintain established carbon-intensive industries, and some business lobby groups advocate for a rollback of energy transition policies [34,146,147]. Therefore, such regulations are essential because governments vary in their levels of transparency and approaches to fighting corruption, which may expose foreign investors and their investments to political and regulatory risks and undermine their confidence [148]. Moreover, such clauses align with FET requirements and contribute to the generally accepted principles of public law, which mandate that domestic systems adhere to procedural requirements of administrative law, provide sufficient reasons, and act in a comprehensible and predictable manner [33].

Last, but by no means least, it is crucial to underscore the pivotal role arbitral tribunals play in adopting a consistent and predictable approach to transparency requirements while ensuring the intended protections of applicable agreements are upheld. A significant number of investor–state arbitrations in the renewable energy sector, particularly those revolving around transparency issues, have been filed under the ECT against the Government of Spain. These cases, commonly known as the “Spanish Saga Cases”, stem from a series of regulatory reforms implemented by the Government of Spain to address the increasing tariff deficit of the electricity system, impacting foreign investments in the sector. Despite similar disputed measures and laws applicable in these cases, each arbitration has been subject to different levels of arbitral subjectivity. As a result, in some cases the arbitrators have emphasised a particular criterion when deciding on a breach of the host state’s transparency obligations [149]. For instance, in *Stadtwerke München GmbH v Spain*, the tribunal acknowledged that a lack of transparency could be sufficient to constitute a breach of the FET obligation under Article 10(1) of the ECT. Nonetheless, it held that this would require “a continuing pattern of non-transparent actions by a government over time, and that such a continuing pattern was not proven in this case” [150]. Furthermore, arbitral tribunals have largely disregarded the independent transparency clause under the ECT (Article 20), rendering it ineffective, despite its legal potential to significantly benefit renewable energy investments [49].

The Spanish Saga Cases have revealed arbitral inconsistencies and uncertainties surrounding the host states’ transparency obligations and their margin of appreciation in implementing non-transparent measures affecting renewable energy investments [49,50]. While investor–state dispute settlement lacks stare decisis, and inconsistency is often cited as a drawback, it is essential to admit that even well-drafted, definite, and comprehensive transparency clauses in IIAs favouring foreign investments in renewable energy may not yield the desired outcomes unless, and until, tribunals are willing to adhere to general principles of interpretation. This includes the principle of ‘effet utile’, which requires treaty provisions to be interpreted in a manner that ensures their effectiveness (*ut res magis valeat quam pereat*), reflecting the intentions of the drafters [151].

5. Conclusions

While our analyses primarily followed a deductive approach, the challenges encountered by renewable energy projects such as *Belo Monte*, *Inga-3 Basse Chute (BC)*, and *Mid-Size Hydropower Development Technical Assistance (TA)* are all indicative of the potential broad-reaching implications of transparency requirements on renewable energy initiatives worldwide. Moreover, the experience of the Spanish Saga cases confirms this conclusion, illustrating the profound role that IIAs, and particularly their transparency obligations, can play in protecting the interests of foreign investors in the renewable energy sector.

However, it is one thing to know the content of IIAs, and quite another to accept them uncritically. Therefore, this article has been both a tribute to, and a critique of, contemporary IIAs in terms of their approach to transparency. Unfortunately, most IIAs do not contain comprehensive transparency clauses. To contribute effectively to the renewable energy transition and alleviate investors' concerns in this sector, these instruments need to keep pace with modern transparency requirements. As we have seen, transparent practices by host states can impact foreign renewable energy investments/investors in three major ways.

First, the high costs and difficulties of R and D in exploring viable renewable energy sources and other investment opportunities in many countries necessitate the participation of foreign investors and a transparent exchange of information. Although most IIAs have overlooked this, the China–Kuwait BIT is exemplary, as it explicitly asks the parties to consult about investment opportunities and other beneficial projects.

Second, with the increase in renewable energy patents filed worldwide and growing intellectual property concerns among investors engaged in these projects, particularly in the light of emerging threats such as cyber-attacks, modern IIAs need to offer additional protection of foreign investors against host states' shortcomings that could compromise their data and privacy. This article finds the innovative provisions adopted by the Japan–Mongolia EPA, USMCA, and the Trade and Cooperation Agreement between the UK and Moldova to be constructive approaches that other IIAs could follow. These agreements have introduced new institutional frameworks to enhance intellectual property rights protection or call for particular cooperation among the parties and the utilisation of their current frameworks to detect and address cyber security risks.

Third, given the prevalence of renewable energy incentives in several countries, these programmes need to be offered transparently to protect foreign investors against possible monopolies and discriminatory treatments by host states. Here again, fair distribution of information is at stake, as many IIAs have been totally silent on the obligations of host states in this respect. This research finds the provisions of the DR-CAFTA and the Republic of Korea–Cambodia FTA, which have established “contact points” to facilitate the exchange of information about relevant laws and regulations, with a view to fight corruption, as prominent examples for future IIAs to consider.

Principally, incorporating such tailored transparency clauses into IIAs can, *ceteris paribus*, help to create a level playing field for foreign investors in the renewable energy sector and protect them against possible discriminatory and anticompetitive practices by host states.

Having regard to the content of IIAs, it is evident that states' approaches to transparency and their implications are evolving. It is promising that a handful of new IIAs have adopted relatively comprehensive transparency obligations. However, it remains to be seen how these clauses will work in practice and whether future IIAs will follow suit. Similarly, investment tribunals need to recognise transparency as a component of FET that broadens the umbrella of investment protection in favour of renewable energy investments. Tribunals should adopt consistent interpretations of transparency clauses to enhance predictability and reliability in the investment environment, in line with the principle of ‘*effet utile*’. Otherwise, many clauses of IIAs may be rendered nugatory in practice, contrary to the original intention of their negotiators.

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