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How Are Indigenous and Local Communities' Rights Over Their Traditional Knowledge and Genetic Resources Protected in Current Free Trade Negotiations? Highlighting the Draft Trans-Pacific Partnership Agreement (TTPA)

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The article analyzes the relevant traditional knowledge provisions of two chapters of the TTPA: on intellectual property rights and on the environment. There is no agreement where these provisions shall be included. There is also wide disagreement over the content of the specific provisions. Some states want to have a widest possible scope of the public domain, and no provisions for sanctioning the taking of genetic resources and associated traditional intellectual property without the consent of indigenous peoples and local communities. The article investigates whether and in which form indigenous peoples are given stronger rights over their intellectual property in international legal instruments, compared to non-indigenous traditional communities. It finds that in many legal instruments, there is no difference. The strongest provisions on traditional knowledge are, however, found in an instrument that applies only to indigenous peoples, the UN Declaration on the Rights of Indigenous Peoples (UNDRIP). The article also investigates whether the rights of indigenous peoples and local communities are stronger in the realm of traditional knowledge than in the realm of genetic resources. It finds that this is generally the case. The provisions are analyzed from the perspective of collective decision-making, defensive protection and positive protection.

Keywords WIPO; Nagoya Protocol on Access and Benefit-Sharing; traditional knowledge; human rights; indigenous peoples

Drafts of a chapter on intellectual property rights (IPR) in the Trans-Pacific Partnership Agreement (TPPA), which includes Australia, Brunei Darussalam, Canada, Chile, Japan, Malaysia, Mexico, New Zealand, Peru, Singapore, United States of America and Vietnam, has been leaked (TTPA, 2013a). The negotiations started between three of them in 2002: Chile, New Zealand and Singapore, with Brunei joining before the Trans-Pacific Strategic Economic Partnership was signed in 2006 (New Zealand Ministry of Foreign Affairs and Trade, 2006). Most attention has been paid to the provisions regulating copyright (Centre for Law and Democracy, 2013) and access to medicines (Bhardwaj and Oh, 2014). This article analyzes the draft provisions on patents, traditional knowledge and genetic resources.

More recently, the draft chapter on environment of the TTPA has been made available (ENV; TTPA, 2013b). There are disagreements on the wording of and the appropriate chapter for including relevant provisions on traditional knowledge and genetic resources. The United States and Japan are said to oppose the inclusion of these provisions in the chapter on intellectual property, rather keeping these provisions in the environment chapter (TTPA, 2013a, p. 45n122). The draft environment chapter does not, however, seem adequately framed to encompass traditional knowledge and genetic resources. In article 1 of the draft environment chapter, environmental laws is defined narrowly as laws whose primary purpose is "the protection of the environment, or the prevention of a danger to human life or health [...]," relating to either pollution or conservation. It is explicitly stated that such laws do not extend to "managing the subsistence or aboriginal harvesting of natural resources [...]." The chapter on environment has been briefly reviewed (Kelsey, 2014).

Harvesting of natural resources encompasses harvesting of genetic material of various kinds. The World Intellectual Property Organization (WIPO) adopts a definition of genetic material that encompasses (extract): "material of plant, animal, or microbial origin, such as medicinal plants, agricultural crops and animal breeds" (WIPO, 2014a; for additional definitions, see WIPO, 2014b, pp. 17–8). This definition includes material that is explicitly excluded from the environmental chapter of the TTPA. Hence, if the TTPA chapter on environment is to include traditional knowledge and genetic resources, the definition of what is to be included in the chapter has to be widened.

In the article, the most relevant draft provisions regulating traditional knowledge and genetic resources provisions of the IPR chapter and the environment chapter will be analyzed, seen in light of relevant treaties and other instruments. As the title indicates, traditional cultural expressions will not be analyzed. Three issues arising from the TTPA negotiations will be addressed: (1) recognition of indigenous peoples' rights to be involved in any decision-making with regard to utilization of genetic resources and associated traditional knowledge; (2) recognition of indigenous peoples' rights to prevent appropriation of genetic resources and associated traditional knowledge (defensive protection); (3) indigenous peoples' exclusive rights over genetic resources and associated traditional knowledge, including benefits derived from these rights (positive protection). As both chapter drafts specify which states that are in favor of and oppose the different proposals, this chapter seeks to outline the different states' positions and explain the reasons for these various positions.

First, however, in order to embed the analysis in a clearer conceptual and legal framework, there will be clarifications of indigenous peoples and their traditional IPRs as recognized by international law, followed by clarifications of other traditional (non-indigenous) communities and their traditional IPRs as recognized by international law.

Indigenous Peoples and Traditional Intellectual Property Rights

The term "indigenous peoples" is primarily applied throughout the article, acknowledging that their rights have stronger recognition under international law than other communities that are not indigenous. This follows from common article 1 of the International Covenant on Economic, Social and Cultural Rights (ICESCR) and International Covenant on Civil and Political Rights (ICCPR), and articles 3 and 4 of the 2007 UN Declaration on the Rights of Indigenous Peoples (UNDRIP), where also the four states who initially voted no, have come out in favor of the UNDRIP (Hanson, 2011).

The UN does not have an authoritative definition of indigenous peoples, but it is generally accepted that to be termed indigenous a community must have resided in a state's territory before the establishment of a state, having distinct institutions and cultures, being in a non-dominant position, and having a self-understanding of being indigenous, seeking to maintain one's ancient traditions (UN Forum for Indigenous Issues Secretariat, 2006). As will be elaborated below, the term indigenous peoples must not be read so as to include only those indigenous peoples that are recognized by the national parliaments or governments, but can also encompass peoples that have a traditional living that is highly dependent upon natural resources within a given territory.

Moreover, the phrase traditional IPRs, and not *collective* IPRs is applied in the article. There is no doubt that the majority of traditional intellectual property is held by collectives. The UNDRIP, however, refers to the term collective in only three provisions, articles 1, 7.2 and 40, as well as once in the preamble. The term "collective" was deleted from the provision that became article 31 of the UNDRIP (Chávez, 2009, p. 104; on article 31 of the UNDRIP, see also Montes and Cisneros, 2009, p. 162). While the term "collective" is not explicitly applied in the relevant treaties, the way the specific provisions are formulated leave no doubt that the collective aspect is important, as will be seen below.

This article does not address the question on whether the IPRs system as emerging within the Western world is at all appropriate to encompass the traditional knowledge (Ougamanam, 2008), but takes as its starting point that traditional intellectual property protection is being increasingly recognized. Australia has referred to it as a third pillar in the work of WIPO, in addition to the Berne and the Paris conventions (WIPO, 2003, p. 13). Moreover, while traditional IPRs must be seen in a larger context, including land, self-determination, cultural heritage and human rights (Taubman and Leistner, 2008, p. 175; see also Haugen, 2012, pp. 101–23), the intellectual property system provides a legal basis to protect against both misappropriation and commodification (Taubman and Leistner, 2008, p. 79), implying that much traditional knowledge cannot be understood as belonging to the public domain. Protection of traditional knowledge as undisclosed information, particularly in the form of know-how, is analyzed by Taubman and Leistner (2008, pp. 37–8) and will not be analyzed further in this article.

As specified above, three related questions on indigenous peoples' traditional IPRs as read out from international treaties and non-binding documents will be explored: participatory rights in decision-making; rights to *defensive* protection and rights to *positive* protection.

We will answer these questions by analyzing six main sources. First, the 2001 International Treaty on Plant Genetic Resources for Food and Agriculture (ITPGRFA). Second, the 1994 United Nations Convention to Combat Desertification in Countries Experiencing Serious Drought and/or Desertification, Particularly in Africa (UNCCD); Third, the 2010 Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from their Utilization to the Convention on Biological Diversity (Nagoya Protocol), which is to enter into force 3 months after the 50th ratification; by March 2014 there are 29 ratifications and an additional 72 states that have signed the Nagoya Protocol. Fourth, the UN human rights treaties and the interpretative material that have been developed by the so-called treaty bodies. Fifth, the UNDRIP. Sixth, the two draft instruments, on intellectual property and genetic resources (WIPO, 2013) and on the protection of traditional knowledge (WIPO, 2014c), both negotiated under the auspices of WIPO Intergovernmental Committee on Intellectual Property and Genetic Resources, Traditional Knowledge and Folklore (WIPO ICG), both of which will be presented to the WIPO 2014 General Assembly for an eventual adoption.

As concerns traditional IPRs applying to genetic resources, rights to participation as collectives are explicitly recognized in the Nagoya Protocol. Article 5.2 recognizes "established rights of these indigenous and local communities over these genetic resources [...]," which should be read together with article 7, requiring states to "ensuring that traditional knowledge associated with genetic resources that is held by indigenous and local communities is accessed with the prior and informed consent or approval and involvement [...]" These provisions are further strengthened by article 12 of the Nagoya Protocol (traditional knowledge associated with genetic resources). Prior consent implies that consent is given before the appropriation takes place. Informed consent implies that it is specified what the appropriated resources or knowledge will be used for. Recently, the term "free" is also included as the first term, namely that the consent is given without any kind of manipulation, either rewards or coercion, but this requirement is not applied in the treaties and declarations analyzed in this article.

Traditional IPRs are explicitly recognized in the UNDRIP, article 31.1, on indigenous peoples' "right to maintain, control, protect and develop their intellectual property [...]," and UNDRIP article 11.2 specifies that the states are to take effective redress measures if indigenous peoples' intellectual property is "taken without their free, prior and informed consent [...]." UNDRIP article 11.2 will be analyzed in more detail below, under defensive protection.

Other legal instruments do include the right to participation in the context of traditional knowledge. In the draft WIPO instrument on traditional knowledge, the draft text has many references to prior informed consent, but only one draft provision includes the requirement of mutually agreed terms (WIPO, 2014c,

annexure, p. 17 (alternative article 5.1(c)). These provisions might, however, be amended in the final negotiations.

The ITPGRFA article 6.2(c) specifies as one measure for the sustainable use of plant genetic resources "plant breeding efforts [...] with the participation of farmers, particularly in developing countries"; see also article 13.2(b)(ii). Moreover, the ITPGRFA article 9.2(c) recognizes the "right to participate in making decisions, at the national level, on matters related to the conservation and sustainable use of plant genetic resources for food and agriculture." While genetic resources are obviously relevant for traditional IPRs, the ITPGRFA does not require that farmers and farming communities have influence over decisions relating to IPRs.

The UNCCD has one reference to participation in the provision on traditional knowledge, with article 18.2(a) saying that local populations are to participate in making "inventories of such technology, knowledge, know-how and practices and their potential uses [...]" Such inventories will exclude IPRs on such knowledge and know-how.

Human rights treaties do not address traditional IPRs, but two interpretations, on the right to take part in cultural life and on the rights to enjoy the moral and material benefits of one's intellectual production, adopted by the Committee on Economic, Social and Cultural Rights (UN CESCR), are relevant (UN CESCR, 2009 (General Comment 21); UN CESCR, 2006 (General Comment 17)). General Comment 21 reads in paragraph 37: "Indigenous peoples have the right to act collectively to ensure respect for their right to maintain, control, protect and develop their [...] traditional knowledge [...]." While it is important to specify that these peoples have a right to act collectively, General Comment 21 does not specify any consequences if the indigenous peoples are prevented from acting collectively.

General Comment 17 says in paragraph 32 that states should "[...] ensure the effective protection of the interests of indigenous peoples relating to their productions, which are often expressions of their [...] traditional knowledge." By applying the phrase "protection of their interests," it is reasonable to understand this as encompassing preventing appropriation of traditional intellectual property without the indigenous peoples' consent or approval. The paragraph does not apply the term rights, which can be explained by the fact that the relevant ICESCR provision (article 15.1(c)) applies the phrase "moral and material interests."

Hence, we see that there is recognition of the rights of participation in the context of traditional IPRs as held by collectives, with the different international instruments having diverse wording and emphasis. The most explicit wording is found in instruments which are not formally binding under international law, as the Nagoya Protocol has not entered into force, and as the UNDRIP is formally a declaration.

As concerns the *defensive* protection, the most explicit provision is found in UNDRIP article 11.2, reading:

> States shall provide redress through effective mechanisms with respect to their [...] intellectual [...] property taken without their free, prior and informed consent or in violation of their laws, traditions and customs.

By not specifying—notwithstanding the requirement that the measures shall be "effective"—what such redress mechanisms shall be, it is difficult to determine exactly what this refers to. It could refer to costly proceedings before the courts to seek to have patents revoked, as the eligibility requirements are allegedly not met. Alternatively, it could refer to swifter and less costly *administrative* procedures. In both instances, however, the indigenous peoples in question would need to be supported by one or more non-governmental organization (NGO), either financially or by legal counsel, as most indigenous peoples would most likely not be in a position to bring a case neither judicially nor administratively.

The other international instruments are less explicit. The requirement that indigenous peoples' prior and informed consent is compulsory if access to traditional knowledge is to take place in a legitimate manner, as specified by article 7 of the Nagoya Protocol, is the most explicit provision on the defensive protection of traditional knowledge. The scope of this provision is weakened by the two phrases applied in the introduction, namely "In accordance with domestic law" and "as appropriate." The ITPGRFA does not specify any defensive protection beyond the general wording of article 9.2(a) on protection of traditional knowledge. The draft WIPO instrument on genetic resources specifies in the bracket paragraphs of draft article 3 that the scope of the draft instrument is to avoid grant of erroneous patents and misappropriation (WIPO, 2013, annexure, p. 7), and similar formulations can be found in draft article 4 of the draft instrument on traditional knowledge WIPO, 2014c, annexure, p. 15). As for human rights instruments, the relevant provisions of the relevant general comments are quoted above.

Also here, the UNDRIP provides the most explicit wording, and the outcome of the negotiations under the auspices of WIPO cannot be predetermined.

As concerns the *positive* protection, in accordance with UNDRIP article 31.2 "[...] States shall take effective measures to recognize and protect the exercise of these rights," which are listed in article 31.1 (to maintain, control, protect and develop traditional knowledge). The term "recognize" implies that some form of positive protection is foreseen. The wording of UNDRIP articles 31.1, 31.2 and 11.2 has led one author to claim that IPRs are recognized in the UNDRIP "in a manner that implies the creation of a *sui generis* system" (Xanthaki, 2009, p. 31; *contra*: Kiene, 2009, p. 281). The argument in support of Xanthaki's view is the formulations "effective measures to recognize and protect" and "effective redress mechanisms."

"Effective" in an intellectual property context is about having an exclusive right to prevent certain acts relating to the protected material, with mechanisms to make it possible for the right holder to enforce the rights against any external actor, and where the exclusive rights apply to any material or knowledge that is given some form of protection (Haugen, 2007, pp. 268–9, 285). An argument against the position by Xanthaki is that the UNDRIP provisions does not explicitly require a new legislation, and moreover that an international declaration does not create legally binding obligations upon states—even if the UNDRIP has been referred to in domestic legislation and national court decisions (Wong, 2011, p. 40 note 118), as well as by UN treaty bodies and international human rights courts (Barelli, 2014, p. 15, *n* 63 and 64). The UNDRIP has a higher authoritative role than other UN declarations, with the exception for the UN Declaration of Human Rights, and as argued by one author, states "should use [UNDRIP] article 31 as a reference point for their work concerning the intellectual property rights of indigenous peoples" (Barelli, 2014, p. 15).

Irrespective of how the relevant UNDRIP provisions are implemented, it should be noted that the temporary enclosure that IPR builds upon does not necessarily correspond to the customary law of indigenous peoples. Therefore, the first part of UNDRIP article 31.2, saying that measures in the context of genetic resources and traditional knowledge are to be taken "[i]n conjunction with indigenous peoples [...]" is important.

The UNCCD specifies the positive protection in a relatively clear manner, by specifying in article 18.2(b) that the states shall:

> ensure that traditional technology, knowledge, know-how and practices are adequately protected and that local populations benefit directly, on an equitable basis and as mutually agreed, from any commercial utilization of them or from any technological development derived there from.

This provision requires adequate protection of traditional knowledge. It also asserts that such protection will provide for commercial benefit sharing. The introductory text of article 18.2 says that states are to "protect, promote and use traditional knowledge."

Similar approaches, but with vague requirements and the qualifications that such measures are to be undertaken "in accordance with domestic law" and "as appropriate" are found in the ITPGRFA and the Nagoya Protocol. Within the ITPGRFA there are provisions on monetary and non-monetary benefit sharing—whose implementation has not met the expectations (Correa, 2013). The benefit-sharing potential of the Nagoya Protocol is too early to assess.

In summary, the most explicit formulations are found in the UNDRIP. The analysis also shows that the recognition of traditional IPRs for indigenous peoples is an emerging subject matter under international law, and not all states are fully prepared to recognize such rights, as the ongoing negotiations under the auspices of WIPO ICG bear witness to.

Other (Non-Indigenous) Communities and Traditional Intellectual Property Rights

Based on the fact that many states are reluctant to recognize that they have indigenous peoples on their land, and the objective difficulties in specifying who is indigenous and who is not, this might result in tensions. A premise for this section is a presumption that seemingly much stronger rights can be enjoyed by those belonging to recognized indigenous peoples as compared to the rights enjoyed by those belonging to communities that are not recognized as being indigenous. As for indigenous peoples, three related questions will be analyzed: participatory rights; rights to *defensive* protection and rights to *positive* protection.

With the exception of UNDRIP, which applies only to indigenous peoples, the five sources as those analyzed in the section on indigenous peoples above will be analyzed in this section, but the human rights sources are primarily the International Convention on the Elimination of All Forms of Racial Discrimination (ICERD) and its Committee on the Elimination of All Forms of Racial Discrimination (CERD), and other human rights soft-law documents and regional human rights jurisprudence will also be applied.

As concerns the traditional IPRs, neither the ITPGRFA nor the Nagoya Protocol, nor the UNCCD specify stronger participatory rights for indigenous communities than for other communities. Hence, farming communities (under the ITPGRFA), local communities (under the Nagoya Protocol) and local populations (under the UNCCD) are entitled to the same rights as are indigenous peoples. This observation applies also to the draft WIPO instruments, but there is one provision of the traditional knowledge draft instrument, on representation of indigenous peoples in a national authority to administer rights, specifying participation of indigenous peoples (WIPO, 2014c, pp. 18–9).

Regarding participation rights for non-indigenous communities, CERD asserted in 1996 that these communities have the right to self-determination, and this right is particularly important for preserving these communities' culture and identity (UN CERD, 1996, paragraph 10; see also UN Human Rights Committee, 1994, paragraph 7; and Barelli (2014, p. 11)). Moreover, the Inter-American Court of Human Rights has recognized the right to free, prior and informed consent (FPIC) as a collective right for two communities (Saramaka people and Moiwana people) that are not recognized as being indigenous, but whose special relationship with their ancestral lands and territories was recognized as crucial for their survival (de Schutter, 2013, p. 536n131). Even more recently, the UN-REDD Guidelines for Free, Prior and Informed Consent requires States to "secure FPIC from communities that share common characteristics with indigenous peoples [...]" (UN-REDD, 2013b, p. 12; see also p. 26).

We see that the distinction between indigenous and non-indigenous peoples is not strictly upheld on the international plane. The issue is rather whether the communities in question are depending on

land they have traditionally inhabited and on the resources they have traditionally harvested for their survival.

On the *defensive* protection, the prior and informed consent requirement of article 7 of the Nagoya Protocol applies to local communities. As article 7 specifies that such measures are to be taken in accordance with domestic law, and as appropriate, the strength of this provision is limited, however.

The CERD has referred to intellectual property on relatively few occasions, and then in the context of recognition of IPRs for recognized indigenous peoples, not minorities (UN CERD, 2013, p. 4).[1] Neither the CESCR has specified IPRs and corresponding obligations for other than indigenous peoples (UN CESCR, 2011a, p. 7, 2011b, p. 10, 2013, p. 5). Moreover, in the two CESCR general comments, the minorities are listed in separate paragraphs from indigenous peoples, with weaker defensive (and positive) protection of their intellectual property as compared to indigenous peoples (UN CESCR, 2006, paragraph 33, 2009, paragraph 32).

Finally, as concerns *positive* protection, there are rather weak provisions in the relevant treaties. The ITPGRFA article 9.2(a) says that protection of traditional knowledge is one way to promote farmers' rights, but leaves it to each state how to go about to ensure such protection. The draft WIPO instruments, when they are adopted and enter into force, might provide some form of positive protection also for local communities, but the main emphasis in the current drafts (WIPO, 2013, 2014c) is on defensive protection. Human rights treaties have a too general wording to be of much use, but indigenous peoples have called for a more active role by human rights bodies in standard-setting activities also in the realm of protection of traditional knowledge (UN Working Group on Indigenous Populations, 2002, p. 7).

We saw above that the tendency is to give less emphasis on the clear distinctions between indigenous peoples and traditionally communities that share common characteristics with indigenous peoples. Still, however, indigenous peoples are given much more attention than other minorities. As an example, while indigenous peoples are not explicitly mentioned in the ICERD, and while the CERD has specified that also ethnic minorities have the right to self-determination (UN CERD, 1996, paragraph 10), the CERD individual complaints and early warnings reports have a bias in favor of indigenous peoples. When CERD has addressed the FPIC requirement in the context of land, only one reference has been made to minorities (UN CERD, 2012, p. 4), while all other references are to indigenous peoples (UN-REDD, 2013a, pp. 16–46).[2]

Hence, the international instrument that has the most explicit provisions on IPRs protection for collectives is UNDRIP, which applies only to indigenous peoples. While there are other international treaties (ITPGRFA; Nagoya Protocol (not entered into force)) that recognize local and farming communities as having similar rights as indigenous peoples in enjoying traditional IPRs protection, these have less explicit provisions. Therefore, also acknowledging the non-binding nature of the UNDRIP, the international provisions on the recognition of traditional IPRs on the international level are limited.

There are, however, regionally based protection systems, most notably the 2000 Andean Community Decision 486 on a Common Intellectual Property Regime. Three provisions stand out: articles 3 (traditional and collective knowledge), 22 (joint inventorship) and 26(i) (documenting traditional knowledge). Among nationally based protection systems, India's 2001 Protection of Plant Varieties and Farmers' Rights Act (Act No. 53) is most interesting. Four provisions are relevant: articles 16.1(d) (recognizing as breeders group of farmers or community of farmers), 41 (recognizing local communities' contribution in the evolution of any variety), 43 (consent of farmers who have developed a farmers variety), and 44 (exemption of fees for any farming community's legal proceedings). Space does not allow for a detailed examination of these provisions, but it should be noted that Peru is both a party to the Andean Community Decision 486 and a part of the TTPA negotiations.

We now turn to the draft TTPA chapters, structuring the analysis under the three dimensions of participation, defensive protection and positive protection.

Who Is Eligible to Influence Decision-Making on Utilization of Genetic Resources and Associated Traditional Knowledge?

In the two TTPA draft chapters, there are two articles that are relevant: SS.13 of the draft TTPA chapter on environment (ENV) and article QQ.E.23 of the draft chapter on IPR. Hence, when paragraphs are referred to, these paragraphs are found within these two articles.

Paragraph 4 of ENV "recognize the sovereign rights of States over their natural resources, and that the authority to determine access to genetic resources rests with the national governments." Wording on state sovereignty is also found in paragraph 2 of IPR, but formulated so that the power of the state applies also to derivatives of genetic resources. I will first address the sovereignty issue and then the issue of derivates.

While sovereignty formulations are found in preambular paragraph 3 of the Nagoya Protocol and in preambular paragraph 14 of the ITPGRFA, it is important to understand these provisions as relating to the external dimension. That this emphasis on states' sovereignty in relation to external actors should not be applied to prevent indigenous peoples and other minorities from exercising their legitimate human rights was argued by UN Special Rapporteur on the rights of indigenous peoples before the WIPO IGC (UN Special Rapporteur, 2013, section 4). If the sovereignty provision is understood as giving an exclusive right of the state to determine access to natural and genetic resources in disrespect of the rights and interests of indigenous peoples and minorities, this would be in clear contradiction of provisions on the right to self-determination and enjoyment of cultural rights of human rights treaties, and a range of provisions of the UNDRIP.

Derivatives are defined by the Nagoya Protocol article 2(e) as "a naturally occurring biochemical compound resulting from the genetic expression or metabolism of biological or genetic resources, even if it does not contain functional units of heredity." Hence, a derivative is taken from a biological or genetic resource, either through a chemical or a physical process. Derivatisation is the technique which transforms a chemical compound into another compound or product, and this product is termed a derivative.[3] There is in principle no reason why indigenous peoples and local communities cannot master such a technique. In the WIPO draft instrument on genetic resources, there is no agreement on whether the derivatives shall be included in the definition of traditional knowledge associated with genetic resources (WIPO, 2013, annexure, p. 2). There is also no agreement in the TTPA negotiations. The opposing states include Australia, Chile, New Zealand and Singapore, and those states that want derivates to be included under the TTPA sections on genetic resources and traditional knowledge, so that derivatives can be understood as traditional knowledge, are Brunei, Malaysia, Peru and Vietnam (TTPA, 2013a, p. 45, 2013c, p. 4, 2013d, section SS.13). The opposing states must be understood as wanting to limit the scope of what can fall within the exclusive domain of traditional IPRs, as this might restrict the scope of conventional IPRs.

The scope of what can be protected as traditional knowledge is generally subject to diverse views. As an example, traditional knowledge which has ceased to be the exclusive knowledge of indigenous peoples or local communities ("already available without restriction to the general public") is currently bracketed text in WIPO's draft instrument on traditional knowledge (WIPO, 2014c, annexure, p. 21). That knowledge that is generally available cannot be subject to intellectual property protection is the position of most states, as this is in line with the general novelty requirement of patent rights and plant breeders' rights. The position of indigenous peoples will be contrary, as they have not been in possession of tools which has made it possible for them to prevent this knowledge from falling into the public domain. As noted by the UN Special Rapporteur on the rights of indigenous peoples before the WIPO IGC (UN Special Rapporteur, 2014, p. 7):

> one of the most important purposes of this Committee is precisely to prevent misappropriations of traditional knowledge that conventional intellectual property law considers to be in the public domain. To exclude this entire category of subject matter from protection would, in my opinion, render the work of the Intergovernmental Committee considerably less relevant.

Hence, indigenous peoples want a broad scope of traditional knowledge that can be subject to some form of traditional IPRs. Most states, on the other hand, prefer a more limited scope of traditional knowledge eligible for protection, so that as much traditional knowledge as possible is understood to be in the public domain. This must be understood to be the core of indigenous peoples' decision-making as concerns genetic resources and traditional knowledge.

Preventing Appropriation of Genetic Resources and Associated Traditional Knowledge Through Prior Informed Consent

We saw above that the Nagoya Protocol article 7 defines prior informed consent by (or approval and involvement from) indigenous peoples and local communities as a prerequisite for the appropriate access of traditional knowledge associated with genetic resources. The draft TTPA ENV chapter does not include this requirement at all in relation to traditional knowledge, while the draft TTPA IPR chapter says—with bracketed text—that such access to traditional knowledge associated with genetic resources is conditional upon indigenous peoples' and local communities' prior informed consent, or approval and involvement; Australia, Chile, Singapore and the United States being the opposing states (TTPA, 2013a, paragraph 3 (b), 2013c, p. 4). Peru and Mexico are the states proposing a stronger reference to indigenous and local communities' approval and involvement when preserving and utilizing traditional knowledge and innovations (TTPA, 2013d, section SS.13).

Access to genetic resources *per se* is regulated by requiring in paragraph 5 in the draft ENV chapter and paragraph 3(a) of the draft IPR chapter. Both provisions say that it is *states* that are to give the prior informed consent for access of genetic resources.

Is there a justification for this different emphasis on who is to give the consent regarding access to genetic resources, as compared to access to traditional knowledge associated with genetic resources? Turning first to the Nagoya Protocol, there is a difference between article 6 (Access to genetic resources) and article 7 (Access to traditional knowledge associated with genetic resources). Both apply the terms "in accordance with domestic law" and "as appropriate." The former states in article 6.2 an "aim of ensuring that the prior informed consent or approval and involvement of indigenous and local communities is obtained [...]." Having an aim that consent or approval is obtained is not a strict requirement. Nagoya Protocol article 7 also applies the phrase "aim of ensuring" but has a different ordering, and ends with the requirement "that mutually agreed terms have been established." Hence, in the absence of an agreement, consent or approval, traditional knowledge cannot be accessed as specified by Nagoya Protocol article 7.

In the draft WIPO instrument on genetic resources, when specifying what is to be understood as misappropriation, there are two bracketed alternatives; either lack or consent by "those who are authorized" or "competent authority" (WIPO, 2013, annexure, p. 3). This implies that the consent regarding access to genetic resources is understood to be given primarily by domestic political authorities, but these authorities can specify that indigenous peoples and local communities can also be authorized to give consent.

In the UNDRIP article 31.1, the right to maintain, control, protect and develop applies equally to genetic resources and to traditional knowledge. Article 31.1, unlike Article 11.2, does not refer to consent

or approval, but the verb control must be understood as encompassing the right to reject access in given circumstances. General Comment 21, which reiterates the wording of the first sentence of UNDRIP article 31.1, includes a sentence specifying the FPIC (UN CESCR, 2009, paragraph 37; see also UN CESCR, 2006, paragraph 32).

In summary, in adopted treaties and treaties still under negotiation, there is a slight difference in emphasis on the prior informed consent requirement as regards access to genetic resources and as regards access to traditional knowledge associated with genetic resources. This difference is not of such a kind that there is a basis for allowing those seeking access to genetic resources that have been maintained, conserved and developed by any indigenous peoples or local communities *not* to obtain prior informed consent by these indigenous peoples or local communities.

In the TTPA draft chapters, the possibility to prevent appropriation of genetic resources and associated traditional knowledge is also affected by the fact that the verbs do differ. In the draft IPR chapter, New Zealand proposes that prior informed consent *may* be obtained, while Peru and Malaysia proposes that such consent *shall* be obtained. In the draft ENV chapter, the proposal is that such consent *should* be obtained. It is a wide difference between a "shall" and a "may" requirement. By New Zealand's proposal, the consent or approval by indigenous peoples and local communities is not required, only optional.

The paragraph is currently opposed by three states: Australia, Chile and Singapore, as well as the United States—as the United States is said to oppose paragraphs 3, 4 and 5 of the traditional knowledge article in the ENV chapter (TTPA, 2013c, p. 4).

Moreover, a proposal that non-compliance with paragraph 3 of the IPR chapter (on prior informed consent to access genetic resources, traditional knowledge and benefit sharing from the use of such resources or knowledge) shall be met by "appropriate, effective and proportionate measures" is opposed by four states, namely Australia, Chile, New Zealand and Singapore (TTPA, 2013a, paragraph 7). It is also logical that the United States is opposing, as it is opposing the inclusion of the related paragraphs in the draft ENV chapter. By not acknowledging that non-compliance with the access and benefit-sharing requirements shall be met by adequate measures; these states then implicitly allow for impunity for those accessing genetic resources or traditional knowledge in disregard of the rights and interests of the relevant indigenous peoples and local communities.

Finally, it is relevant to mention that there is no disclosure requirement in the draft chapters, requiring patent applicants to specify from where the genetic resource and the traditional knowledge resulting in the patentable invention have been taken. Several proposals have been put before the Council on TRIPS (Trade-Related Aspects of Intellectual Property Rights) and the Trade Negotiations Committee of the World Trade Organization (WTO), and proposals on a disclosure requirement have also been presented before the WIPO IGC (European Communities, 2005, annexure; see also WIPO, 2014c, annexure, p. 12 (draft article 3.1(d)*bis*) and p. 16 (draft article 4*bis*)). The WTO proposal with the broadest support has more than 110 states as co-sponsors (WTO, 2008), but only one state that is a part of the TTPA negotiations: Peru.[4] Paragraph 4 of this proposal reads:

> Members agree to amend the TRIPS Agreement to include a mandatory requirement for the disclosure of the country providing/source of genetic resources, and/or associated traditional knowledge for which a definition will be agreed, in patent applications. Patent applications will not be processed without completion of the disclosure requirement.

The proposed amendment is to add a new paragraph to TRIPS Article 29 (Conditions on Patent Applicants). The proposal has not been brought further, however.

While there has been no agreement on disclosure obligations within the WTO, there are free-trade agreements with disclosure obligations. An agreement where Peru is a party is the 2010 Free Trade Agreement between the Republic of Peru and the EFTA States (Peru-EFTA FTA). The different approach in gaining prior informed consent to access genetic resources and access to traditional knowledge is seen in paragraph 7 of Article 6.5. Paragraph 5 of Article 6.5 also addresses genetic resources and traditional knowledge in two different sentences—and with references that weakens the provision ("According to their national law [...]" and "As far as provided in their national legislation [...]"). While there is no provision saying that patent applications will not be processed without completion of the disclosure requirement, as was seen in the WTO proposal above, paragraph 6 of Article 6.5 of the Peru-EFTA FTA specifies "administrative, civil or criminal sanctions if the inventor or the patent applicant willfully make a wrongful or misleading declaration of the origin or source." This provision can be contrasted with some states' opposition against appropriate, effective and proportionate measures, as proposed in draft paragraph 7 of the IPR chapter of the TTPA.

Recognition of Rights Over Genetic Resources and Associated Traditional Knowledge, and Derived Benefits

The draft chapters do not specify a comprehensive protection system for IPRs in order to protect new and applicable knowledge that has emerged from a traditional context. Therefore, the rights relating to benefit sharing are the most explicit positive rights that can be read out from the draft chapters.

When outlining what benefits the utilization of the knowledge or resources might result in, differences exist between the text of the IPR chapter and the ENV chapter. The latter simply says with regard to traditional knowledge that states "encourage the equitable sharing of the benefits arising from the utilization of such knowledge, innovations and practices" (TTPA, 2013b, paragraph 3); and with regard to genetic resources that benefits "should be shared in a fair and equitable way [...] upon mutually agreed terms" (TTPA, 2013b, paragraph 5). Here, we see that the wording concerning genetic resources is somewhat stronger than the wording concerning traditional knowledge. In this context, it is important to remember that the draft TTPA understands that consent for accessing genetic resources is to be done by the competent public authority. Consent for accessing traditional knowledge is according to some states negotiating the TTPA to be done by the indigenous people or local community—even if there are some states that do not want to include this specification at all.

The terms applied in the two chapters of the TTPA are not of such a kind as to constitute a basis for any new IPRs system. The terms applied in the ENV chapter are, however, relatively positive in appreciating the knowledge and innovations of indigenous and local communities (TTPA, 2013b, paragraph 3). By stating that the knowledge, innovations and practices are to be respected, preserved and maintained, the parties implicitly take upon themselves duties to ensure that such preservation and maintenance is actually done. As these duties are not spelled out in greater detail, rather limiting the rights of the indigenous peoples and local communities over their resources and knowledge, there is a risk that the provisions of the draft chapters might directly undermine what is positively appreciated.

In this context, the use of the term indigenous communities does also deserve criticism. While the term indigenous communities is also applied in for instance the Peru-EFTA FTA, in accordance with the international developments, the term indigenous communities should be replaced by the term indigenous peoples.

The positive appreciation of the innovations and knowledge is unique to the draft ENV chapter. The draft IPR chapter never specifies who are the ones developing this knowledge and innovations.

Conclusion

It cannot be reiterated enough how important it is to have a holistic and comprehensive understanding of IPRs in the context of indigenous peoples and local communities. First, the rights over land and resources that is derived from the right to self-determination. Second, the realms within which the right to self-determination should be exercised, including the pursuing of a peoples' economic, social and cultural development, in accordance with article 3 of UNDRIP. Third, the material basis for upholding the traditional culture, and hence the identity of any indigenous peoples or local community.

This article has seen that the knowledge, innovations and practices of indigenous peoples and local communities, while being appreciated in principle, risks to be weakened in practice by section on traditional knowledge in the proposed TTPA. While not analyzed specifically in this article, the TTPA also build on a wide understanding of the public domain and calls for measures to facilitate access to the material that has fallen into the public domain (TTPA, 2013a, p. 11, Article QQ.A.13)). Together with the proposed impunity for those accessing material and knowledge without free and informed consent by indigenous peoples and local communities, this indicates a development towards stronger disrespect of the rights of indigenous peoples and local communities.

It might not be surprising that Australia and the United States have positions that seek to place upon themselves the least onerous duties with regard to indigenous peoples, while Peru seems most concerned for the rights of indigenous peoples. It is, however, somewhat surprising that a country like Chile sides with the Australian and US position. Chile has not signed the 2010 Nagoya Protocol and has signed but not ratified the 2001 ITPGRFA. An analysis of Chile's policy on traditional knowledge and genetic resources finds considerable flaws in Chilean legislation and policies and gives specific advice on how Chile can be better aligned with laws and policies of other Latin American states, also drawing upon the documents developed within the context of the WIPO IGC (Rojas, 2007).

The duration of these WIPO IGC negotiations, on the other hand, show that indigenous peoples' IPRs are not easily recognized under international law. This applies both to the scope of the substantive rights over genetic resources and traditional knowledge, and to the strength of the procedural rights when external actors seek to access these resources and knowledge. As the article has shown, UNDRIP, being a non-binding declaration of considerable authority, recognizes both the substantive and the procedural aspects of IPRs, including effective redress mechanisms when peoples' intellectual property have been appropriated without their consent. Other instruments, like the ITPGFRA and the (not yet entered into force) Nagoya Protocol are less explicit and apply formulations like "in accordance with national legislation," which weakens these provisions. On the positive side, the awareness of indigenous peoples and local communities' intellectual heritage and innovations are gaining increased recognition in an increasing number of states, and will be important for tackling global challenges. Treaties like the TTPA should better seek to balance the interests between different rights holders and nurture such practices, knowledge and innovations.

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Notes

1. The CERD recommendation reads: "The Committee recommends that the State party promptly announce a timetable to implement the Waitangi Tribunal's decision [Wai 262 of 2011] in a manner that fully protects the intellectual property rights of Māori communities over their traditional knowledge and genetic and biological resources."

2. The FPIC requirement is linked to property rights, which is recognized in ICERD article 5(d)(v).
3. The definition given by the Royal Society of Chemistry is: "The transformation of a chemical compound (the 'educt') into another similar compound (the 'derivative') by altering one or more of its functional groups" www.rsc.org/publishing/journals/prospect/ontology.asp?id=CMO:0001485 [Accessed March 2014].
4. The co-sponsors are (in alphabetical order): ACP Group and the African Group, Albania, Brazil, China, Colombia, Croatia, Ecuador, the European Communities, Georgia, Iceland, India, Indonesia, the Kyrgyz Republic, Liechtenstein, the Former Yugoslav Republic of Macedonia, Moldova, Pakistan, Peru, Sri Lanka, Switzerland, Thailand and Turkey.

References

Barelli, M. (2014) 'The United Nations Declaration on the Rights of Indigenous Peoples: A Human Rights Framework for Intellectual Property Rights', in M. Rimmer (ed.) *A Research Handbook on Indigenous Intellectual Property*. Edward Elgar, Cheltenham (forthcoming; pre-published version available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2380581 [Accessed June 2014]).

Bhardwaj, K. and Oh, C. (2014) *The Trans-Pacific Partnership Agreement: Implications for Access to Medicines and Public Health* [online]. Available at www.unitaid.eu/images/marketdynamics/publications/TPPA-Executive-Summary.pdf [Accessed March 2014].

Centre for Law and Democracy (2013) *Analysis of the Draft Intellectual Property Chapter of the Trans-Pacific Partnership* [online]. Available at www.law-democracy.org/live/wp-content/uploads/2013/12/TPP.IP-final.Dec13.pdf [Accessed March 2014].

Chávez, L.E. (2009) 'The Declaration on the Rights of Indigenous Peoples Breaking the *Impasse*: The Middle Ground', in C. Claire and R. Stavenhagen (eds.) *Making the Declaration Work: The United Nations Declaration on the Rights of Indigenous Peoples, IWGIA Document No. 127*. International Work Group for Indigenous Affairs, Copenhagen, pp. 96–106.

Correa, C.M. (2013) *ITPGRFA: Options to Promote the Wider Application of Article 6.11 of the SMTA and to Enhance Benefit-Sharing. Legal Opinion* [online]. Available at www.evb.ch/cm_data/ITPGRFA_Legal_opinion_Final_130731.pdf [Accessed March 2014].

De Schutter, O. (2013) 'The Green Rush: The Global Race for Farmland and the Rights of Land Users', *Harvard International Law Journal*, 52, 503–59.

European Communities (2005) *WIPO/GRTKF/IC/8/11, Disclosure of Origin or Source of Genetic Resources and Associated Traditional Knowledge in Patent Applications*. Document submitted by the European Community and Its Member States.

Hanson, E. (2011) *UN Declaration on the Rights of Indigenous Peoples* [online]. Available at http://indigenousfoundations.arts.ubc.ca/?id=1097 [Accessed March 2014].

Haugen, H.M. (2007) *The Right to Food and the TRIPS Agreement—With a Particular Emphasis on Developing Countries' Measures for Food Production and Distribution*. Martinus Nijhoff, Leiden & Boston.

Haugen, H.M. (2012) *Technology and Human Rights: Friends or Foes? Highlighting Innovations Applying to Natural Resources and Medicine*. Republic of Letters Publishing, Dordrecht.

Kelsey, J. (2014) *TPPA Environment Chapter & Chair's Commentary Posted by Wikileaks. Issues for NZ* [online]. Available at www.itsourfuture.org.nz/wp-content/uploads/2014/01/TPPA-Environment-Chapter.pdf [Accessed March 2014].

Kiene, T. (2009) *The Legal Protection of Traditional Knowledge in the Pharmaceutical Field. An Intercultural Problem on the International Arena*. Münster, Waxmann.

Montes, A.R. and Cisneros, G.T. (2009) 'The United Nations Declaration on the Rights of Indigenous Peoples: The Foundation of a New Relationship Between Indigenous Peoples, States and Societies', in C. Claire and R. Stavenhagen (eds.) *Making the Declaration Work: The United Nations Declaration on the Rights of*

Indigenous Peoples IWGIA Document No. 127. International Work Group for Indigenous Affairs, Copenhagen, pp. 138–68.

New Zealand Ministry of Foreign Affairs Trade (2006) *Trans-Pacific Strategic Economic Partnership* [online]. Available at www.mfat.govt.nz/downloads/trade-agreement/transpacific/trans-pacificbooklet.pdf [Accessed March 2014].

Ougamanam, C. (2008) 'Local Knowledge as Trapped Knowledge: Intellectual Property, Culture, Power and Politics', *Journal of World Intellectual Property*, 11, 29–57.

Rojas, J. (2007) 'Traditional Knowledge and Access to Genetic Resources. Critical Elements Towards a National Policy and Legislation for Chile', *Journal of Technology Management & Innovation*, 2, 134–48.

Taubman, A. and Leistner, M. (2008) 'Analysis of Different Areas of Intellectual Resources, Section 1: Traditional Knowledge', in S. von Lewinski (ed.) *Indigenous Heritage and Intellectual Property: Genetic Resources, Traditional Knowledge and Folklore*, 2nd edition. Kluwer Law International, Alphen an den Rijn, pp. 59–179.

TTPA (2013a) *Intellectual Property [Rights] Chapter Consolidated Text* [online]. Available at https://wikileaks.org/tpp/static/pdf/Wikileaks-secret-TPP-treaty-IP-chapter.pdf [Accessed March 2014].

TTPA (2013b) *Environment Chapter Consolidated Text* [online]. Available at http://wikileaks.org/tpp-enviro [Accessed March 2014].

TTPA (2013c) TTP: Country Positions (6 November) [online]. Available at https://wikileaks.org/IMG/pdf/tpp-salt-lake-positions.pdf [Accessed March 2014].

TTPA (2013d) Report from the Chairs and Consolidated Text for the Environment Chapter [online]. Available at http://wikileaks.org/tpp-enviro-chairsreport/ [Accessed March 2014].

UN CERD (1996) *General Recommendation XXI, The Right to Self-Determination, A/51/18(SUPP), annexure VIII.*

UN CERD (2012) *CERD/VNM/CO/10-14, Concluding Observations of the Committee on the Elimination of Racial Discrimination, Viet Nam.*

UN CERD (2013) *CERD/C/NZL/CO/18-20, Concluding Observations of the Committee on the Elimination of Racial Discrimination, New Zealand.*

UN CESCR (2006) *E/C.12/GC/17, General Comment No. 17, The Right of Everyone to Benefit From the Protection of the Moral and Material Interests Resulting From Any Scientific, Literary or Artistic Production of Which He or She Is the Author (article 15, paragraph 1).*

UN CESCR (2009) *E/C.12/GC/21, General Comment 21, the Right to Take Part in Cultural Life (Article 15.1(a)).*

UN CESCR (2011a) *E/C.12/ARG/CO/3, Concluding Observations of the Committee on Economic, Social and Cultural Rights, Argentina.*

UN CESCR (2011b) *E/C.12/RUS/CO/5 Concluding Observations of the Committee on Economic, Social and Cultural Rights, Russian Federation.*

UN CESCR (2013) E/C.12/COG/CO/1, Observations Made in the Absence of an Initial Report From the Congo and Adopted by the Committee at Its Forty-Ninth Session (12–30 November 2012) [published 2 January 2013].

UN Forum for Indigenous Issues Secretariat (2006) *Who Are Indigenous Peoples*? [online]. Available at http://www.un.org/esa/socdev/unpfii/documents/5session_factsheet1.pdf [Accessed March 2014]

UN Human Rights Committee (1994) *General Comment No. 23: The Rights of Minorities (Art. 27).*

UN-REDD (2013a) *Legal Companion to the UN-REDD Programme Guidelines on Free, Prior and Informed Consent (FPIC): International Law and Jurisprudence Affirming the Requirement of FPIC.*

UN-REDD (2013b) *Guidelines for Free, Prior and Informed Consent.*

UN Special Rapporteur on the Rights of Indigenous Peoples (2013) *Statement. Indigenous Peoples' Rights to Genetic Resources and Traditional Knowledge* [online]. Available at http://unsr.jamesanaya.org/statements/statement-indigenous-peoples-rights-to-genetic-resources-and-traditional-knowledge [Accessed March 2014].

UN Special Rapporteur on the Rights of Indigenous Peoples (2014) *Keynote Address. Intellectual Property and Genetic Resources: What Is at Stake for Indigenous Peoples*? [online]. Available at www.wipo.int/edocs/mdocs/tk/en/wipo_grtkf_ic_26/wipo_grtkf_ic_26_indigenous_panel_james_anaya.pdf [Accessed March 2014].

UN Working Group on Indigenous Populations (2002) *E/CN.4/Sub.2/2002/24 Report of the Working Group on Indigenous Populations on Its Twentieth Session.*

WIPO (2003) *WO/GA/30/8, Report From the 30th Session of the WIPO General Assembly.*

WIPO (2013) *WIPO/GRTKF/IC/26/4 Consolidated Document Relating to Intellectual Property and Genetic Resource, Rev 2.*

WIPO (2014a) *Genetic Resources* [online]. Available at www.wipo.int/tk/en/genetic [Accessed March 2014].

WIPO (2014b) *WIPO/GRTKF/IC/27/INF/7, Glossary of Key Terms Related to Intellectual Property and Genetic Resources, Traditional Knowledge and Traditional Cultural Expressions.*

WIPO (2014c) *WIPO/GRTKF/IC/27/4, The Protection of Traditional Knowledge: Draft Articles, Rev 2.*

Wong, T. (2011) 'Introduction', in T. Wong and G. Dutfield (eds.) *Intellectual Property and Human Development. Current Trends and Future Scenarios.* Cambridge University Press, Cambridge, pp. 1–59.

WTO (2008) *TN/C/W/52, Draft Modalities for TRIPS Related Issues.*

Xanthaki, A. (2009) 'Indigenous Rights in International Law', *Melbourne Journal of International Law*, 10, 27–37.