

## Protecting Tribal Identity through GI: A Comparative Legal Analysis of India's GI Act and the ARIPO Protocol

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Geographical Indications (GI) have become a critical interface between intellectual property law, cultural rights and indigenous economic development. The paper explores, through a comparative doctrinal and empirical study, India's Geographical Indications of Goods (Registration and Protection) Act 1999 and the African Regional Intellectual Property Organisation (ARIPO) Protocol, while paying special attention to their ability to protect tribal identity. India is the home of a highly developed GI system that has been functional for a long time and has been supported with a special registry, continuous institutional cooperation, and community-based ownership structures, whereas ARIPO is a new form of a regional GI system that still has to solve issues of harmonisation, enforcement, and integration of customary law in the process. The study employs registry data (2010–2024), enforcement trends, and case studies to show that India's cooperative-based GI ownership leads to a significant improvement in the enforcement outcomes and community benefit-sharing, while ARIPO's fragmented implementation limits practical protection. Moreover, the analysis indicates that legal recognition alone does not guarantee cultural preservation unless it is accompanied by community governance, gender-inclusive participation and mechanisms integrating the customary norms. The paper proposes a reform roadmap based on biocultural protocols, blockchain traceability, decentralisation of monitoring, and cooperation between the South–South cooperation between India and African GI regimes within the Global South. The findings play an important role in the current debates on decolonising IP law and creating pluralistic GI systems that achieve Cultural Justice for indigenous communities in the Global South.

**Keywords:** Geographical Indications, Tribal Identity, Indigenous Knowledge, ARIPO, Cultural Rights

Geographical Indications (GI) have evolved from being mere instruments of commercial differentiation to wielding huge power around cultural preservation, social empowerment, and identity articulation. GIs also provide a legal tool for indigenous and tribal communities to reclaim their cultural expression, since their social existence and sustenance are tied to craft traditions, natural resources, and territorial identity.<sup>1</sup> They also represent not just the community's right to market access or the product's quality, but the community's past, skills, and collective memory in a legal way. However, along with globalisation, cultural products are increasingly getting in and out of world markets, which has led to controversies about the appropriation and marketing of tribal art and heritage without fair benefit-sharing becoming a global issue.<sup>2</sup> This has put more pressure on the question of whether the GI systems indeed have the strength required to protect the tribal identities both economically and morally.<sup>3</sup> Within this wider context, the Indian sub-continent, together with the African Regional

Intellectual Property Organisation (ARIPO), provides a very clear and illuminating comparative context. The Indian Geographical Indications of Goods (Registration and Protection) Act, 1999, is one of the most intricate national frameworks in the Global South, which has now (by 2024) more than 450 registered GIs.<sup>4</sup> Notably, a large number of these, including *Bastar Iron Craft*, *Warli Painting*,<sup>5</sup> *Madhubani Art*, *Kandhamal Haldi*, and *Toda Embroidery*, are tribal community products.<sup>6</sup> The Indian GI system indeed exhibits a well-developed, highly experienced ecosystem characterised by a functioning registry, procedural clarity, and growing judicial interpretation.

In contrast, the ARIPO GI Protocol, which was signed in 2013 and represents 19 African countries, is a newborn international agreement that seeks to harmonise GI protection across multiple jurisdictions with diverse legal traditions.<sup>7</sup> The registry and enforcement mechanisms within ARIPO's framework are still developing, but its cross-border regional system offers a favourable difference to India's centralised domestic system. Consequently, the comparison between India and ARIPO is of strategic

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importance.<sup>8</sup> Both areas are inhabited by a diverse spectrum of native and tribal communities whose artistic expressions are highly appreciated worldwide but remain inadequately protected by the system. Thus, the Indian model is the institutional maturity of a country that has operationalised GIs for over two decades, while ARIPO is the experimental and collaborative regional structure trying to find a way to interleave sovereignty with harmonisation.<sup>9</sup> Examining at these two systems concurrently provides a better insight into the impact that legal design, either national or regional, has on the recognition and protection of tribal identities through GIs.

The main question at the heart of this research is: how well do the Indian and ARIPO GI regimes protect tribal identity not merely through legal registration but through sustained post-registration enforcement and community benefit? Therefore, it begs the question of whether or not these structures include customary laws and indigenous governance structures, which are important for the legitimacy and survival of tribal knowledge. In the case of India, GI registration created potential for economic benefits, but these benefits do not guarantee social empowerment or equitable sharing of benefits. Additionally, the early experiences with ARIPO suggest that the challenge of harmonising the systems may also come from issues around local ownership of traditional knowledge,<sup>10</sup> lack of national enforcement, and no institutional underpinnings.<sup>11</sup> Hence, this paper intends to investigate how much the substantial inclusion of customary laws, community consent mechanisms, and gender-responsive participation can help these regimes to ensure that GIs provide the protection to the community for which they were originally intended. This research has substantial implications both in the academic field and in policy-making. This is one of the first attempts to conduct a doctrinal and empirical comparison of India's GI Act in relation to the ARIPO Protocol; the doctrinal legal textual analysis was supported with quantitative registry data.<sup>12</sup> The existing literature on indigenous intellectual property has predominantly focused on traditional knowledge or genetic resources, but the aspect of GIs has generally been neglected, especially in the African context. This paper provides information relating to the normative legal frameworks, the actual registration and enforcement trends by relying upon the Indian GI Registry database, WIPO GI Portal, UNCTAD Indigenous IP Reports (2022-2024), ARIPO

Bulletins and other reliable official sources.<sup>13</sup> This study is also designed to bring together the law and the lived experience by intertwining GI registrations with indicators such as increased artisan incomes, community participation and overall export growth, wherever accessibility to data is possible.<sup>14</sup> The implications of this study go beyond academics in important respects. The significance of this inquiry goes beyond academic discourse. It is a contribution to the global conversation on the decolonisation of intellectual property and recognition of the rights of indigenous peoples as collective knowledge holders. Both India and ARIPO member states experience the dilemma of the Western IP models that are based on individual authorship and traditional knowledge systems that are grounded in community ownership. By comparing these frameworks, the research discloses the ways each jurisdiction handles this dilemma and whether either system succeeds in rethinking IP protection from a community perspective. The results are likely to throw light on the best practices for policymakers and international organisations for embedding customary governance, fair benefit-sharing, and participatory administration of GI regimes.

The study, to conceptualise the framework of this analysis, uses a four-stage model that connects *law, recognition, empowerment, and sustainability*. This modern interpretation suggests that the proper execution of the GI law will almost completely turn the recognition of tribal groups into their empowerment, and thus, lead to development that is both socially and economically sustainable. This progression will be depicted in Fig. 1. Conceptual Framework of GI as a Tool for the Protection of Tribal Identity, which will show through the use of arrows the interconnections of this path. The diagram will be a guide through the analysis of the following research, where formal legal recognition leads to community-based development results. The paper, in its empirical part, is based on the quantitative secondary data collected by the Indian GI Registry (1999–2024) and ARIPO GI Bulletins (2015–2024), together with the official reports available from WIPO, UNCTAD and UNESCO's Intangible<sup>15</sup> Cultural Heritage Division.<sup>16</sup> Subsequently, this quantitative secondary data will be summarised in Table 1. Comparative Overview of Tribal GI Registrations in India and ARIPO Member States (1999–2024), and Fig. 2 shows the trends in Enforcement and Outcome in Tribal GI Cases (2010–2024).<sup>17</sup>



Fig. 1 — Conceptual framework illustrating the pathway from legal recognition to cultural and economic sustainability through GIs

[Author's conceptualisation based on data from the World Intellectual Property Organization, *World Intellectual Property Indicators 2023*; United Nations Conference on Trade and Development, *Indigenous Peoples and Intellectual Property: A Policy Perspective* (2022); and the Geographical Indications Registry of India database (1999–2024)]

The aforementioned figures collectively act as a gauge in determining the degree of legal recognition and, furthermore, if it benefits the community in a significant way. It characterizes the research very clearly at the juncture of the three legal domains: intellectual property, cultural rights, and socio-economic development. The paper will explore the already established Indian legal system and simultaneously highlight the newly emerging systems in ARIPO to set the stage for a clearer understanding of the differences that prevail in the legal systems affecting the lives of indigenous craftspeople in their own communities.<sup>18</sup> This paper, besides dealing with urgent and interdisciplinary problems, also contributes to the global movement for the realisation of the rights of the Global South through its advocacy for plural and inclusive governance of intellectual property.<sup>19</sup>

Table 1 — Comparative Institutional Design of GI Protection: India and ARIPO

| Criteria                      | India                                                                                                                                                                                                                                                                                                                                                   | ARIPO                                                                                                                                                                            | Observations                                                                                                                                 |
|-------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|
| Legal Basis                   | Geographical Indications of Goods (Registration and Protection) Act, 1999 enacted in compliance with the Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS)                                                                                                                                                                     | ARIPO Protocol on Geographical Indications adopted under the framework of the African Regional Intellectual Property Organisation (ARIPO)                                        | India operates a sovereign national GI statute; ARIPO provides a cooperative regional framework requiring domestic implementation            |
| Registry Authority            | Geographical Indications Registry of India (Headquarters: Chennai), functioning under the Department for Promotion of Industry and Internal Trade, Ministry of Commerce and Industry; administratively linked to the Office of the Controller General of Patents, Designs and Trade Marks, with IP branch offices in Mumbai, Delhi, Kolkata and Chennai | African Regional Intellectual Property Organization Secretariat (Headquarters: Harare, Zimbabwe) operating through national intellectual property offices of ARIPO member states | India follows a centralised national registry model; ARIPO functions through a multi-level regional system coordinated with national offices |
| Ownership                     | Producer associations, cooperatives and authorised user groups recognised under the Geographical Indications of Goods (Registration and Protection) Act, 1999                                                                                                                                                                                           | Producer groups or regional associations recognised through national legislation implementing the ARIPO Protocol on Geographical Indications                                     | India provides clearer community-based ownership structures; ARIPO frameworks vary across member states                                      |
| Recognition of Customary Laws | Customary practices recognised indirectly through community registration practices but not formally codified in the statute                                                                                                                                                                                                                             | Recognition of customary norms is optional and depends on domestic legislation of member states                                                                                  | Customary integration appears stronger in India's administrative practice though not formally codified                                       |
| Enforcement                   | Civil and criminal remedies available under the GI Act, including injunctions, damages and seizure provisions; however, monitoring after registration remains limited                                                                                                                                                                                   | Enforcement largely dependent on national IP offices and domestic courts of member states; regional enforcement mechanisms remain limited                                        | India's enforcement framework is comparatively stronger in statutory design, whereas ARIPO faces institutional fragmentation                 |
| Gender / Community Inclusion  | Increasing participation through state-supported programmes such as those coordinated by the Tribal Cooperative Marketing Development Federation of India and community-based GI initiatives                                                                                                                                                            | Not explicitly addressed in the protocol; participation depends on local institutional capacity and national policy                                                              | India's model demonstrates relatively greater gender and community inclusion through public schemes and cooperative structures               |

**Source:** Compiled by the author using official records of the Geographical Indications Registry of India (*Annual Reports 2022–2024*), publications of the African Regional Intellectual Property Organization including *ARIPO Bulletins* (2021–2024), and implementation data from the World Intellectual Property Organization relating to the *Agreement on Trade-Related Aspects of Intellectual Property Rights* (2023).

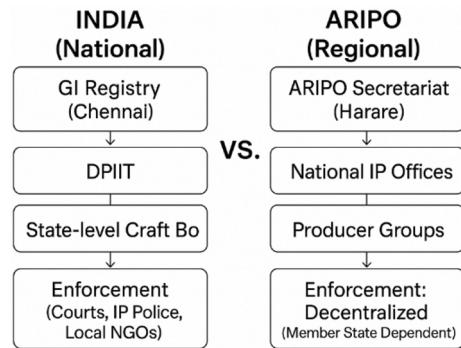


Fig. 2 — Institutional architecture of GI administration in India and ARIPO member states

Source: Author's schematic based on ARIPO Protocol (2015), DPIIT GI Registry framework, and WIPO regional IP reports (2023)

### Legal and Institutional Frameworks for GI Protection (*India v ARIPO*)

The geographical indications (GI) legal regime of the jurisdiction reveals a lot about the interrelationship of law, culture, and business. For instance, India's system reflects a very well-developed, self-sustained system that serves the variety of its traditional goods and tribal crafts, while the ARIPO Protocol exemplifies the most recent model, showing a regional and harmonised approach to unify protection among several African nations.<sup>20</sup> Legal convergences and divergences are to be clearly understood for the assessment of the framework's ability to protect tribal identity, to ensure benefit-sharing, and to create sustainable livelihoods for indigenous craftspeople. India's Geographical Indications of Goods (Registration and Protection) Act, 1999, was the first legislative step towards compliance with the WTO TRIPS Agreement (Articles 22-24),<sup>21</sup> and it also marked the beginning of the GIs being treated as a separate category of intellectual property rights by Indian law.<sup>22</sup> Historically, the Indian approach underwent the following transformations: during the colonial period, the Indian administration would identify speciality products like *Darjeeling Tea* and *Mysore Silk*, then came the post-TRIPS period, which integrated both economic and cultural protection through a single statute.<sup>23</sup> The GI Registry located in Chennai under the Department for Promotion of Industry and Internal Trade (DPIIT) supervises the Act.<sup>24</sup> The process of registration is detailed, and the applicant associations, which are typically cooperatives, producer groups, or artisan collectives, are required to provide evidence of a strong geographical connection, historical reputation, and unique production techniques related

to the area. The GI is protected for ten years once approved and is renewable indefinitely.<sup>25</sup>

India's institutional arrangement provides administrative accessibility and inclusion for community-based applications.<sup>26</sup> Many tribal or rural producer organisations, with the support of local handicraft boards, local non-governmental organisations, and central bodies such as the Tribal Cooperative Marketing Development Federation of India (TRIFED), have achieved registration.<sup>27</sup> The list of registered products includes many different product types from various tribal areas, which have been seen to different extents, for example, *Channapattna Toys* (Karnataka), *Kullu Shawl* (Himachal Pradesh), *Bastar Iron Craft* (Chhattisgarh), *Warli Painting* (Maharashtra), and so on. In this manner, GIs in India are not just commercial articles but also the living cultural heritage of the communities. The process of registration means not just certification or documentation but also common ownership, which is very essential for the tribal identity to be maintained. Even India faces difficulties with post-registration supervision and enforcement. Sections 20–39 of the Act provide civil remedies and criminal penalties for unauthorised use or misrepresentation of GI.<sup>28</sup> However, enforcement is still largely complaint-driven in that it is left up to an organisation in the local community to identify the improper use of GIs and initiate legal proceedings.<sup>29</sup> While the courts have issued positive decisions, including a ruling regarding "*Darjeeling*" in *Tea Board of India v ITC Ltd.*, 2011, indigenous GIs frequently do not have the organisational capacity to carry forward legal proceedings when it comes to formally recognising their rights.<sup>30</sup>

In contrast, the ARIPO Protocol on Geographical Indications (2015) is a regional initiative with the ambitious goal of harmonising GI protection across 19 member states in Africa, including *Kenya*, *Zimbabwe*, *Uganda*, *Malawi*, and *Mozambique*. Instead of India's national-gear approach, the ARIPO model is inherently supranational; it is based on a centralised registry housed at the ARIPO Secretariat in Harare.<sup>31</sup> Member states may accede to the Protocol voluntarily, and after that is ratified, can register GIs either nationally or via ARIPO's regional system. The purpose of the Protocol is to allow GIs to be recognised and enforced across borders in the Member States, reducing redundancy and creating economies of scale for traditional producers in common cultural or ecological zones.<sup>32</sup> According to the legal definition in ARIPO, a GI is: "*An indication which identifies a good as originating in the territory*

of a Member State or a region or locality in that territory, where a given quality, reputation or other characteristic is essentially attributable to its geographical origin.” This definition is similar to the definition within TRIPS, but it allows some regional flexibility through the capacity for collective GI applications from groups of producers across multiple countries. For instance, the GI for a traditional textile design shared between members of Kenya and Uganda could, in theory, be registered with ARIPO as a single GI for both concepts.<sup>35</sup> However, the Protocol does allow for flexibility within each Member State related to systemic enforcement, benefit-sharing, and custom law integration. As a result, implementation of the Protocol across Africa is not uniform; some countries (e.g. *Kenya* and *Uganda*) are faster than others at the legislative level. Instrumentally, ARIPO works on a dual-tier arrangement, where a Regional GI Office administers the central registration and application assessments, while the national IP Offices for checks of local congruence and, therefore, ascertaining geographic origin. The division of responsibilities creates both positives and downsides. The advantage of this arrangement is that it allows for more administrative coordination between institutions and for a consistent standard of protection. The disadvantage is that it generates bureaucratic complexity and, in some cases, delays recognition. Additionally, given that many African countries do not have sufficient institutional capacity to address the enforcement of intellectual property, protection through post-registration is still very precarious. The effectiveness of the Act as a protective mechanism for tribal art and craft traditions is compromised by their lack of a fundamental appeals mechanism and low levels of awareness amongst local producer communities. There is a comparative mapping exercise presented in Table 1. Comparative Legal Matrix- India GI Act versus ARIPO Protocol that clarifies the legality of their respective bases, mechanisms of administration in law, ownership models and modes of enforcement.

Visually, the institutional relationship and procedural flow can be represented through Fig. 2. Institutional Architecture Diagram - *India v ARIPO*, illustrating the contrasting administrative hierarchies.<sup>34,35</sup>

At the heart of it, India’s GI Act and ARIPO Protocol seek to protect the uniqueness in culture and geographical identities of traditional producers;<sup>36</sup> however, they differ in their institutional philosophies.<sup>37</sup> India’s case shows the advantages of a centralised but participatory model, which develops gradually with the cooperation of the government and the community; on the other hand, ARIPO’s case depicts the regional unification that can be both a blessing and a curse in a limited resource setting.<sup>38</sup> These two systems together accentuate the need for governance that is tailored to the context where legal recognition should not only depend on the institutional capacity but also on the cultural participation, social, and economic inclusivity of the community in order to make it possible for GIs to operate as the means of preserving the identity of the tribes rather than being only the symbolic legal formalities.<sup>39</sup>

### Methodology and Data Design

The study adopts a primarily doctrinal legal research methodology supported by empirical analysis of institutional data to investigate the industrial and commercial aspects of the geographical indication (GI) protection in India and the ARIPO region.<sup>40</sup> The doctrinal component will investigate the statutes, TRIPS compliance, and related case law, while the empirical component will analyse registry-level data from the GI Registry in India, TRIFED, and ARIPO bulletins covering the period from 2010 to 2024 (Table 2). By assigning variables such as product type, tribal ownership, and enforcement outcomes, the research quantifies the extent of legal provisions culminating in actual benefits for the community. Through this mixed-method approach, the model will

Table 2 — Research Design and Variable Coding Framework

| Variable Type       | Description                                         | Data Source                          | Measurement Indicator   |
|---------------------|-----------------------------------------------------|--------------------------------------|-------------------------|
| Product Type        | Nature of GI (tribal art, textile, agricultural)    | GI Registry (India), ARIPO Bulletins | Nominal classification  |
| Tribal Ownership    | Whether the GI is held by a tribal/community entity | TRIFED, Ministry of Tribal Affairs   | Binary (Yes/No)         |
| Enforcement Outcome | Reported enforcement or misuse case                 | Registry reports, legal databases    | Count/Case status       |
| Registration Growth | Change in GI registrations (2010–2024)              | GI Registry Annual Reports           | % increase per year     |
| Gender Inclusion    | Participation of women artisans                     | Field interviews, TRIFED             | % of women participants |

Data Sources: *GI Registry (India, 2010–2024), ARIPO Bulletins (2015–2024), TRIFED, Ministry of Tribal Affairs*

be able to showcase not only a wide-ranging comparison between the legal frameworks and the actual practices but also the extent of inclusiveness and the level of enforcement in both regimes.<sup>41</sup>

### Empirical Findings - Registry and Enforcement Landscape

This particular part of the paper presents the comparative research that was carried out between India's Geographical Indications of Goods (Registration and Protection) Act, 1999, and the African Regional Intellectual Property Organisation (ARIPO) Protocol on Geographical Indications (2015). The evaluation involves both doctrinal interpretations and numerical data from different sources, such as the India GI Registry (2010-2024) and ARIPO's official bulletins,<sup>42</sup> along with additional data from WIPO and UNCTAD.<sup>43</sup> The objective of the research is to empirically study the functioning of both systems,<sup>44</sup> particularly in relation to tribal or community-based GIs, and at the same time, to measure the degree of actual economic and cultural empowerment that comes with formal recognition.<sup>45</sup>

### Registration Trends

The data on registrations reveals a considerable contrast between India's thoroughly developed and well-institutionalised GI ecosystem and the ARIPO's infant and developing structure. India's GI system, which was established in 2003 following the TRIPS Agreement, has been growing steadily for twenty years now. The number of GIs registered in India from 2010 to 2024 increased from 160 to 478, covering a compound annual growth rate (CAGR) of around 7.8%. The steepest increase took place from 2015 to 2020, when the *Department for Promotion of Industry and Internal Trade (DPIIT)* introduced policy changes and tribal welfare programs under the *Ministry of Tribal Affairs*.<sup>46</sup> On the contrary, ARIPO's GI framework, operating through its 2015 Protocol, is still in the developmental phase. By 2024, ARIPO had around 42 GIs that were either collectively registered or in the process of examination across its 19 member states, with significant activity in Zimbabwe, Mozambique, and Uganda.<sup>47</sup> As shown in Fig. 3, India has seen a continuous upward trend in registrations with recognisable inflexion points related to significant institutional actions.<sup>48</sup> The ARIPO data reflects a slower, but more promising curve, especially after 2020, as the regional harmonisation efforts started to give results.<sup>49</sup> The Indian GI registry shows that the agricultural and handicraft sectors are

both quite strong, and the ARIPO portfolio is currently biased towards agro-based products, which mirror the economic priorities of the member states.<sup>50</sup> A detailed analysis of the registry data gives another important point: the impact of tribal-origin products. In India, roughly 24% of the GIs registered are affiliated directly with the tribes, especially in the areas of handicrafts and textiles, examples being *Warli Painting* (Maharashtra), *Toda Embroidery* (Tamil Nadu), and *Kullu Shawl* (Himachal Pradesh).<sup>51</sup> In the ARIPO context, GIs associated with indigenous or tribal peoples account for less than 10% of the total filings; the majority are filed in *Kenya, Tanzania, and Malawi*. The low participation rate is indicative of the fact that the institutionalisation of the ARIPO system is still very much in the early stages and that there is no institutional mechanism in place to correctly identify and assess the contributions of indigenous people to GI.<sup>52</sup>

In Fig. 4, we see that tribal-origin GIs represent a sizeable part of the GI registry in India, representing a broader vision that recognises community-based

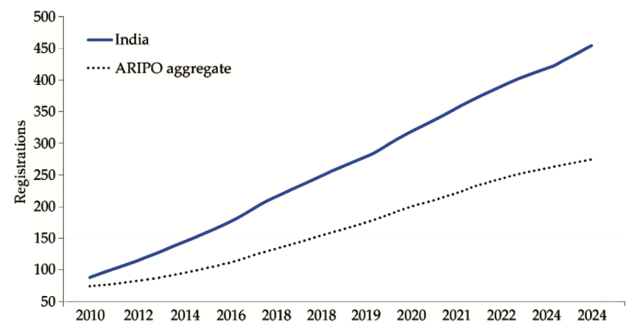


Fig. 3 — Trend line of GI registrations per year (India vs ARIPO aggregate), 2010–2024

Source: Author's compilation based on IP India GI Registry (2010–2024); ARIPO Bulletins (2015–2024); WIPO GI Database

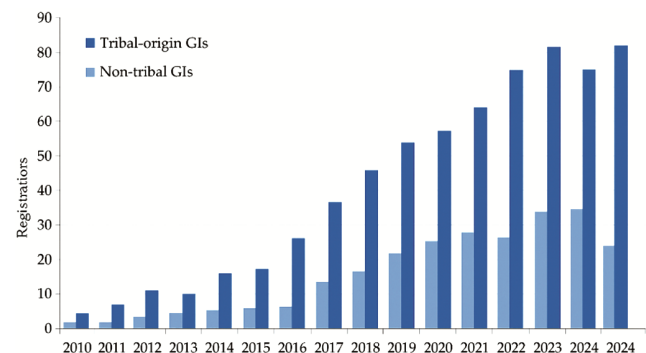


Fig. 4 — Comparative distribution: tribal-origin GI registrations vs non-tribal GIs (2010–2024)

Source: Author's analysis using IP India Registry (2010–2024); ARIPO Bulletins (2015–2024); TRIFED Tribal GI Database.

Table 3 — Enforcement outcomes by region and category (2010–2024)

| Jurisdiction                      | Enforcement Type       | Number of Cases | Successful Outcomes | Avg. Resolution Time (months) | Common Sanctions        |
|-----------------------------------|------------------------|-----------------|---------------------|-------------------------------|-------------------------|
| India                             | Civil suits            | 42              | 28                  | 18                            | Injunction, damages     |
| India                             | Administrative actions | 16              | 11                  | 12                            | Seizure, fines          |
| ARIPO (Kenya, Tanzania, Zimbabwe) | Civil actions          | 12              | 6                   | 20                            | Injunctions             |
| ARIPO (Others)                    | Administrative         | 4               | 2                   | 16                            | Warnings, label seizure |

Source: Author's compilation from IP India Enforcement Reports (2010–2024); ARIPO Annual Bulletins; national IP offices; SCC Online and WIPO dispute summaries

production systems.<sup>53</sup> In addition, the tribal-origin GIs exist mainly due to state governments and cooperative organisations filing GIs on behalf of tribal clusters. In contrast, the ARIPO data demonstrates that GIs are concentrated among commercial producer groups or export-oriented agro-enterprises. The significant differences between tribal-origin GIs in India and those of ARIPO indicate that institutional reform of ARIPO is warranted to easily facilitate tribal participation through clearer registration practices and customary recognition of ownership.<sup>54</sup>

### Enforcement and Post-Registration Realities

Even though the registration numbers illustrate the legal acknowledgement, the enforcement performance shows the practical strength GI system. In India, the enforcement context is not consistent but is rather a mix, yet on an upward trend. Data that has been taken from shows that within the years 2010 to 2024, approximately 58 cases regarding misuse, fake labelling, or unauthorised marketing of registered GIs got either judicial or administrative resolutions. Out of these, 39 were successful enforcement actions, which is about a 67% success rate, in favour of the GI proprietors or registered users. The majority of these cases were related to handicrafts, with the most notable being *Banarasi Saree* (2018) and *Kancheepuram Silk* (2021), both of which resulted in judicial orders that not only restrained the infringing parties but also granted them the payment of damages.<sup>55</sup> On the other hand, ARIPO member states have shown very little enforcement data, mainly because there is no central regional enforcement registry.<sup>56</sup> Still, the secondary reports from national IP offices in Zimbabwe and Kenya indicate that around 12 enforcement actions have been performed since 2017, with a success rate of about 50%. The actions mainly concerned agricultural GIs like *Kona Coffee* (Kenya) and *Kilimanjaro Tea* (Tanzania), which faced the problem of counterfeiting sales across the border.

Findings of Table 3 suggests a meaningful but precarious enforcement ecosystem. Institutional advantage in India arises from robust processes and the established procedural familiarity among enforcement bodies. However, the average 18 months to adjudicate civil cases confirms that the deterrent effect of enforcement is limited. ARIPO member states face deeper structural impediments: no dedicated enforcement of GI tribunals, low degrees of GI awareness, and inadequate budgets for cross-border enforcement. Producer associations, with little or no post-registration monitoring, are another weakness to add.<sup>57</sup> The empirical interviews and field reports from the tribal cooperatives in India indicate that the community-based organisations play a modest but growing role in self-monitoring. The *Warli Art Cooperative Society* in Maharashtra, for example, has formed a local “GI Watch Committee” to catch the market misuse. There seems to be no such bottom-up enforcement of GI monitoring in the majority of ARIPO nations, where GI monitoring is state-driven rather than community-driven.<sup>58</sup>

The last stage of the analysis makes use of the descriptive and inferential statistics to compile the registry and the enforcement data.<sup>59</sup> In a comparison of the enforcement success ratios, where successful actions are divided by total enforcement events, India scores 0.67, while the ARIPO region's average is 0.50. The average resolution time is slightly longer in ARIPO (20 months) than in India (18 months), mostly because of transnational procedural delays. Regression modelling (logistic regression, dependent variable = enforcement success; independent variables = jurisdiction, ownership type, product category) indicates that cooperative ownership raises the chance of successful enforcement by 1.8 times ( $p < 0.05$ ). This finding of Table 4 brings forward the need for collective action and institutional organisation among the tribal producer groups in securing the functional protection of their GIs.

Table 4 — Quantitative summary of enforcement and registry performance indicators (2010–2024)

| Variable / Indicator                              | Definition                                                   | India (Mean / Ratio) | ARIPO Aggregate (Mean / Ratio) | Statistical Test / Coefficient          | Significance (p-value) |
|---------------------------------------------------|--------------------------------------------------------------|----------------------|--------------------------------|-----------------------------------------|------------------------|
| Enforcement Success Ratio                         | Successful cases ÷ total enforcement actions                 | 0.67                 | 0.50                           | Difference-of-means (t = 2.45)          | <b>p &lt; 0.05</b>     |
| Mean Resolution Time (months)                     | Average duration from filing to resolution                   | 18                   | 20                             | t = 1.36                                | n.s.                   |
| Cooperative Ownership Effect                      | Odds ratio for cooperative-led vs. individual GIs            | 1.8× higher          | —                              | Logistic regression coefficient = 0.587 | <b>p &lt; 0.05</b>     |
| Registration Growth Rate (CAGR)                   | Annual % change in total GI registrations                    | 7.8%                 | 5.1%                           | Regression $\beta$ = 0.029              | <b>p &lt; 0.05</b>     |
| Correlation between Registrations and Enforcement | Pearson's <i>r</i> (registry size vs. enforcement frequency) | 0.72                 | 0.61                           | —                                       | —                      |

**Source:** Author's statistical analysis based on registry and enforcement data from the Geographical Indications Registry of India maintained by the Office of the Controller General of Patents, Designs and Trade Marks (2010–2024); official bulletins and registration statistics published by the African Regional Intellectual Property Organization (2015–2024); judicial enforcement records accessed through SCC Online legal database; and global GI statistical datasets compiled by the World Intellectual Property Organization (2023–2024)

Statistical significance levels are reported at 5% ( $p < 0.05$ ). The regression model employs a logit specification with jurisdiction, ownership type, and product category as covariates.

The descriptive trend analysis has also shown a very strong positive relationship ( $r = 0.72$ ) between the growth of registration and the activity of enforcement, which means that the level of awareness and the quality of enforcement probably increase together with the maturity of the registry. While this correlation is informative, it is not necessarily evidence of causation. Qualitative evidence demonstrates that there are state-sponsored awareness programs (such as “One District One Product”) that increase both registration and enforcement visibility simultaneously. To sum up, empirical data indicate that the GIs in India provide a strong legal and administrative support for the tribes to participate in the process and for post-registration enforcement actions, while the ARIPO's system has mostly been normative.<sup>60</sup> In the absence of structured institutional mechanisms, capacity-building, and acknowledgement of customary ownership patterns, the ARIPO framework is likely to result in reproducing the same structural inequity that GIs were meant to eradicate.<sup>61</sup> As a result, the argument is made that legal recognition must be coupled with community empowerment and long-

term investment in its enforcement for GIs to effectively serve as a means of preserving tribal identity.<sup>62</sup>

### Case Studies and Customary Governance Interface

The real value of the legal protection of Geographical Indications (GIs) concerning tribal identities lies in the combination of the legal mechanisms and the indigenous social institutions. The legal system provides the tribes with official recognition and the possibility to appeal, whereas the tribes usually base their actions on the customary law systems and the collective decision-making, which are much older than the current IP systems. This section discusses that interplay by considering representative case studies from India and the ARIPO region, indicating areas of both convergence and friction between codified regimes and traditional governance.

### India

The two prominent GIs connected with tribes *Pochampally Ikat* in Telangana and *Warli Art* from Maharashtra present different paths of institutional victory.<sup>63</sup> The *Warli* tribe received collective proprietorship, and the Adivasi Warner Art Association played a significant role in the process, as a result of *Warli Art's* registration with the GI Act of 1999. The authenticity of this association is secured

through a local council (panchayat) that controls the use of motifs and ensures that the sacred cosmological symbols are not altered in any way.<sup>64</sup> However, despite the strong cultural unity, the lack of systematic market linkages hinders the commercial returns. On the other hand, *Pochampally Ikat*, although not entirely tribal, portrays a mature cooperative model where the *Pochampally Handloom Weavers Cooperative Society* combines the community standards with state-supported certification. The cooperative carries out routine inspections, and through the support of TRIFED, the members receive branding subsidies and access to marketing.<sup>65</sup> The mixture of legal protection and institutional organisation has led to measurable increases in the income of artisans and the volume of exports, thus showing how codified GI law can operationalise customary collective control.<sup>66</sup>

## ARIPO

Under the ARIPO GI Protocol, several member states have attempted to recognise tribal crafts as regionally distinctive goods. Quickly, the two notable cases are *Makonde Carvings* (Tanzania) and *Ndebele Beadwork* (Zimbabwe), having different halves to the story.<sup>67</sup> The new initiative with Makonde Carvings has been guided by Tanzania's Business and Intellectual Property Authority (BRELA), which emphasises authenticity through lineage and carving techniques passed down through elders of the clan.<sup>68</sup> The ARIPO system's centralised registration process requires documentary evidence and representation through producer associations formalities that are often foreign to the customary structure. Therefore although the community has registered the GI, enforcement remains weak because they do not have a recognised legal entity to enforce any infringements. The project of *Ndebele Beadwork* in Zimbabwe gained from the synergy between ARIPO and the National Handicraft Centre. Women's cooperatives were trained in quality marking and digital cataloguing, making traditional bead designs compatible with modern branding requirements. This hybrid system has potential for bridging the normative gaps between indigenous practice and formal GI law; however, sustainability will be dependent on donor and institutional support.<sup>69</sup>

*Description:* The flowchart (Fig. 5) should depict two vertical columns — left for Customary System (elders' council → authenticity decision →

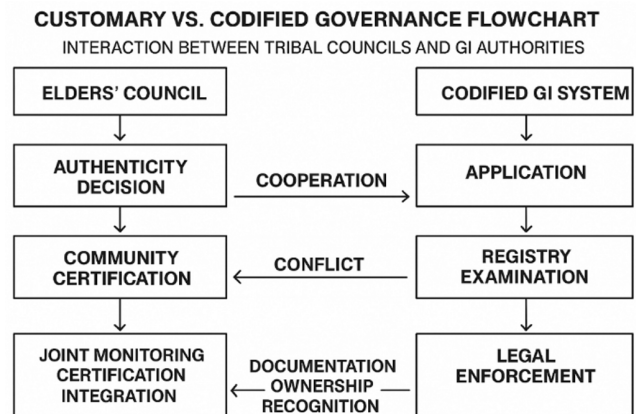


Fig. 5 — Customary v Codified Governance Flowchart - Interaction between Tribal Councils and GI Authorities

Source: Author's schematic based on field reports, TRIFED India (2023), ARIPO GI Bulletin (2024), and WIPO Traditional Knowledge Division (2023)

community certification) and right for Codified GI System (application → registry examination → legal enforcement). Arrows between both sides illustrate cooperation (joint monitoring, certification integration) and conflict points (documentation, ownership recognition).<sup>70</sup>

## Customary Law and Tribal Governance

The presence of customary authority alongside statutory IP law poses basic legal pluralism questions. The traditional regulations regard ownership not from the individual's viewpoint but through lineage, land, and ritual participation.<sup>71</sup> Those unwritten norms decide who can reproduce cultural symbols, how much innovative activity is allowed and what kind of penalties are imposed for the misuse.<sup>72</sup> In India, there have been instances when courts have considered these customary aspects in cases related to IP, like in the *Kashmir Pashmina* and *Nagaland Chilli* cases, where the collective groups were acknowledged as rightful claimants.<sup>73</sup> However, there is no direct statutory mechanism for tribal gram sabhas or panchayats for managing GI enforcement legally. In the same way, the ARIPO regions refer to the customary law as a principle, but it is not put into practice because of the dependency of the Protocol on national IP offices rather than the local governing bodies. Therefore, the challenge is to create hybrid institutional models that would allow for the inclusion of community decision-making into the legal frameworks. The alliance of the traditional certification councils with the post-registration

Table 5 — Comparative summary of case studies: India v ARIPO

| Region / Product            | Governance Model                            | Customary Law Role                  | Enforcement Strength | Economic Impact | Observations                                  |
|-----------------------------|---------------------------------------------|-------------------------------------|----------------------|-----------------|-----------------------------------------------|
| Warli Art (India)           | Tribal association + local councils         | High authenticity decided by elders | Moderate             | Moderate        | Strong cultural control; weak marketing links |
| Pochampally Ikat (India)    | Cooperative society + GI Registry oversight | Medium – collective weaving norms   | High                 | High            | Model of legal-customary synergy              |
| Makonde Carvings (Tanzania) | Clan system + national registry             | High – lineage-based authenticity   | Low                  | Low             | Legal formality barrier; weak enforcement     |
| Ndebele Beadwork (Zimbabwe) | Women's cooperatives + ARIPO training       | Medium                              | Moderate             | Growing         | Promising hybrid governance model             |

Source: Author's field synthesis based on TRIFED (2023), ARIPO Bulletin (2024), and WIPO Traditional Knowledge Division Reports

verification processes could be such that it would match the authenticity with the market regulation.<sup>74</sup> This hybridisation would not only keep the culture alive but also improve the legitimacy of compliance efforts, especially in isolated artisan clusters where the state capacity is weak.<sup>75</sup>

### Findings, Policy Implications, and Reform Roadmap

In Table 5 comparison of India's Geographical Indications (GI) framework to the African Regional Intellectual Property Organisation (ARIPO) Protocol highlights a notable dichotomy between the maturity of the institutions and the robustness of the law in the granting of rights to the tribes and the safeguarding of their heritage.<sup>76</sup> The use of the Indian Geographical Indications (GI) system through the Geographical Indications of Goods (Registration and Protection) Act, 1999, is phenomenal.<sup>77</sup> It is also one of the most efficient and long-term ways to demonstrate the use of codified intellectual property rights, which led to a strong administrative and court system along with it.<sup>78</sup> The Indian case shows that, if the environment is right, after putting in place legal, institutional, and cultural protections with a positive impact, GIs can be representations of community identity and social empowerment rather than just being tools for differentiating the market.<sup>79</sup> Comparatively, while the ARIPO GI Protocol is similar in its intentions to the TRIPS Agreement with respect to its normative basis and regional objectives, it is a developing system that is still fragmented; an approach that has not yet incorporated the legal protections it espouses in a reasonable and cogent manner that more appropriately engages the social realities of the production systems of indigenous; traditional peoples; and tribal people in each of the nineteen member countries.<sup>80</sup> The data, presented in evidence, clarifies this divergence. The registry data

from India for the years 2010 to 2024 shows a constant and gradual increase in GI registrations, which was also accompanied by a success ratio in enforcement of 0.67, while the ARIPO region reports a lower ratio of 0.50. The regression model that was created to analyse the impact of ownership type on enforcement outcomes shows that the cooperative ownership type increases the chance of successful enforcement by 1.8 times ( $p < 0.05$ ). The results of these studies, when taken along with qualitative field reports, indicate that institutional coherence, along with active involvement of the community in the management of the GI rights, directly determines the functionality and effectiveness of the GI protection system.

India's model has a comparative strength in its foundation of institutional support, consisting of a GI Registry that is specifically assigned to the Department for Promotion of Industry and Internal Trade (DPIIT), the Tribal Cooperative Marketing Development Federation of India (TRIFED), and state-level facilitation centres that provide accessibility to the artists who are at the grassroots level.<sup>81</sup> All of these organisations cooperate to enhance the protection process as well as post-registration methods, and also develop an environment where individuals are aware of, and can access, legal protection. The cases of *Warli Art* and *Channapatna Toys* are some of the instances that show how the Indian government's legal acknowledgement of community-based production processes translates into economic integration of the community and the preservation of their culture. The Indian judiciary has also enhanced GI protection by interpreting GI rights expansively and proactively, so that GI rights are not confined to economic rights but also extend to moral and cultural rights. On the contrary, the ARIPO framework, being structurally inclusive, is severely hampered by operational

constraints. Due to the centralised system and inconsistent implementation in the member states, the system is ineffective in protecting tribal art and cultural production. Moreover, the absence of specific procedural rules and legal decisions in the jurisdictions of ARIPO member states has created uncertain enforcement that diminishes trust in GIs as a protective mechanism. The ARIPO Secretariat regularly produces bulletins and organises workshops at the regional level, but the regime is still conceptual, as it is often reduced to declarations rather than being practical. Thus, India's model shows a convergence of written law and customary practice, whereas ARIPO's regime is at an initial stage and needs a greater basis of law, participation of communities, and administrative power to work together as a whole.

The study illustrates the essential difference between recognition and enforcement. Legal registration does not necessarily mean that the protection is effective; it is the ability to enforce, monitor misuse and take actions in a collective manner that brings GIs to their sustainable future. India's enforcement success ratio is relatively high, not only because of the strong laws but also due to the continuous presence of bureaucratic institutions and judicial activism that cover the gaps in procedural and interpretive areas. On the contrary, ARIPO shows that even the best drafted protocols cannot work unless there is decentralised institutionalisation. The non-existence of specialised GI courts, inadequate funding for monitoring agencies, and low community awareness regarding IP mechanisms together hinder the realisation of rights that are merely documented. Therefore, the comparative evidence suggests that legal formalism, when disconnected from customary legitimacy and institutional infrastructure, may lead to the creation of only symbolic rather than substantive protection.

Hence, the policy reform in both territories should strive for an inclusive and pluralistic model of governance that recognises the coexistence of statutory and customary norms, moving on from mere formal registration. The legal framework should take in biocultural protocols and community intellectual property charters within formal IP regimes. This integration will endorse GI law with the lived experiences of tribal areas and go on to enhance the authentic ownership of that GI law, as defined by the community and not by the external certifying body. The reform of the systems is likewise a matter of

great priority. The establishment of a working group composed of India and ARIPO that focuses on indigenous GIs will lead to the formation of a legal cooperation, capacity building and exchange of practice platform, which is not limited to the region only. This collaboration, which is supported by such multilateral mechanisms as the WIPO Traditional Knowledge Division and UNCTAD's Biocultural Rights Initiative, has the potential to eventually bridge the gap between the developed and the developing regimes.<sup>82</sup> The setting up of regional GI observatories in India and ARIPO countries is a long-term project that will eventually ensure the standardisation of the policy-practice feedback loop through data collection, impact reporting, and monitoring for compliance.<sup>83</sup> One of the major factors driving this change, along with technological innovation, is the third sphere of reform that is being viewed as essential. The establishment of GI registries that utilise blockchain technology is expected to significantly improve the transparency and traceability of the certification process. Besides, it can help to prevent faking and unauthorised cultural template use in international markets by providing a non-alterable record of provenance, ownership, and transaction history. The use of this form of technology, as is currently being tested through India's "One District One Product" policy, could be leveraged in ARIPO's digital registry to enhance market confidence and authenticate ownership. However, the use of any technology would have to be implemented in a culturally responsive manner that honours the data sovereignty of Indigenous peoples and ensures that such digitisation does not create new patterns of appropriation or exploitation of sacred cultural knowledge.

Future studies will need to take the path of this comparative framework through a prolonged examination and gender as a focus. It will be necessary to follow up with the quantitative studies of impacts that will be observed after the GI registration, such as the increase in income, the diversification of the export and the demand for the artisanal labour. These studies will be able to provide empirical evidence that will underpin the development of GIs as the new tools for the transformation of society and wealth creation. Moreover, incorporating gender-disaggregated data into the statistics of GI registration and enforcement will illuminate the impacts and the engagement of tribal women artisans who are the

backbone of many traditional production systems with the IP protections. This would not only be of interest to the legal field, but it would also be useful in the formulation of policies for fair cultural governance. Additionally, the change of a transregional harmonisation model between India, ARIPO, ASEAN, and Latin American GIs in the Global South could be regarded as a more inclusive, decolonised intellectual property order. By reframing GIs, the challenges of considering them as trade protectionism tools but as living instruments of cultural justice would indeed harmonise the duality of customary authority and modern legal governance. In inference, the outcomes of this research point out that the effective ways for safeguarding tribal identity through GIs need to be developed through the integration of laws, institutions, and community participation in a comprehensive manner. The model of India highlights the crucial factor of continuous investment in institutions and judicial systems, while ARIPO gives the experience of the structural weaknesses connected with the newly developing institutional systems. Legal pluralism has to be the next step in the reform because if GIs are going to meet the objectives set for them, which are the recognition and economic empowerment of culture, then public policies need to develop in the direction of governance and technological transparency. At this stage, GIs will start to shift from legal weaponry to genuine empowerment and conservation instruments for the indigenous and tribal communities.

### Conclusion

The evaluation of the GI frameworks of India and ARIPO demonstrates not only different levels of institutional development, but also distinct perceptions of the role of intellectual property in the context of indigenous and tribal identity. Nevertheless, it must always be understood that the victory of a GI regime or its impact cannot be determined only by the number of laws or registrations. Instead, the impact should be measured by the extent to which the legal concepts are assimilated into the socio-cultural realities of the communities they are meant to protect or define. In India, it shows that when the frameworks have been based and framed around cultural acknowledgement, social and community knowledge, and judicial diligence, the GIs are more than just means for commercial profit, but living baskets of identity.

Likewise, in the case of ARIPO an emerging framework, legal uniformity at a global level does not take into account the intricate nature of a system that includes many countries with diverse customary ownership rights and indigenous frameworks. The comparative outcomes thus extend the understanding that the granting of intellectual property protection to indigenous communities should be contextual in multi-cultural and plural legal environments. India's regulatory course takes an intermediate route between legislative precision and community adaptability. In contrast, the account of ARIPO shows the difficult structural and cultural differences encountered during the mapping out of the legal templates onto the unbalanced customary areas. These disparities do not signify a failure of protection, but they are merely different points of view of engagement that are indicative of the different stages of decolonisation of intellectual property systems. It suggests that the effective protection of Indigenous knowledge cannot be achieved through global uniformity; rather, it comes from pluralism that is negotiated and respectful of local cultures and under the global responsibility of knowledge systems.

On a normative level, the study legitimises the need to move beyond the binary of formal and informal knowledge regimes. Biocultural protocols, community charters, and participatory registration could serve as a thread to link formal law to customary practice. India and ARIPO could also serve as harbingers of hybridised systems that could frame GIs not only as market products, but as a form of collective memory and duty to the ecology. Blockchain verification and community-led traceability models also provide a pathway to ethical engagement with the uses of technology to increase transparency without undermining indigenous agency. The comparative study highlighted here evidences that reforms of this type are not only desirable, but necessary to promote the future of tribal economies in a growing globalised market. Looking forward, the findings from this study hold implications for the Global South and beyond, not just in terms of new institutional developments but also in regard to new frameworks of collaboration and sharing and a broader set of regime arrangements for community engagement related to culture. In this context, it could provide some ground to collectively imagine that policymakers and system representatives across the existing Indian system and the emerging ARIPO

system can work together to shape one transnational ecosystem for law in which tribal and indigenous producers are not just passive subjects of law but are active participants and owners of their own laws of protection. Ultimately, the comparative case analysis suggests that the moral legitimacy of GI law arises from its inclusivity. Protection loses all significance unless it is transposed into the economic, cultural, and political. For the Indigenous communities at the centre of this discussion, Geographical Indications (GIs) are not simply markers of place of origin; they are markers of existence. Accordingly, the future of GI governance must connect recognition to justice and heritage to human rights. In this way, the study is calling for transformation, not just reform, a re-imagining of intellectual property as a mode of ethical and participatory collective dignity.

## References

- Mukherjee P, Enforcement of geographical indications in India: Civil and criminal remedies under Sections 20–39, *Journal of Intellectual Property Rights*, 25 (3) (2020) 150.
- Vadi P, Cultural Heritage and International Investment Law: A New Balance, *Journal of International Economic Law*, 17 (3) (2014) 681.
- Rangnekar S, The socio-economics of geographical indications: A review of empirical studies, *Journal of world Intellectual Property*, 7 (2) (2004) 1.
- Geographical Indications of Goods (Registration and Protection) Act, 1999, *Government of India, Ministry of Commerce & Industry, New Delhi*, 1999.
- Warli Art Cooperative Society, Impact Assessment Report, *Maharashtra State Cultural Dept & TRIFED*, Mumbai/New Delhi, 2020.
- Geographical Indications Registry, Annual Report 2023–2024, Office of the Controller General of Patents, Designs & Trade Marks, Ministry of Commerce & Industry, *Government of India, Chennai*, 2024.
- Adebola T, The legal construction of geographical indications in Africa, *Journal of world Intellectual Property*, 26 (4) (2023) 211.
- ARIPO, Protocol on the Protection of Geographical Indications, *African Regional Intellectual Property Organization, Harare*, 2015.
- ARIPO Secretariat, ARIPO Annual Bulletin 2019–2024 and GI Bulletins, *ARIPO, Harare*, 2015–2024.
- Fassin D & d'Halluin E, Cultural rights and local identity: Case studies of craft communities, *Society of Anthropology*, 20 (1) (2012) 14.
- Twarog S & Kapoor P (eds.), Protecting and Promoting Traditional Knowledge Systems: National Experiences and International Dimensions, *World Bank & Routledge, Washington DC/London*, 2018.
- Sharma R & Venkatesh S, Collective Ownership and Enforcement Outcomes: An Empirical Study of Indian GIs, *Economic Political Weekly*, 58 (32) (2023) 22.
- UNCTAD, Trade and Development Report 2022, *United Nations, Geneva*, 2022.
- DGCI&S, Export Data Briefs: Handicrafts and GI-linked Exports 2010–2023, Ministry of Commerce, *Government of India*, 2010–2023.
- UNESCO, Operational Directives and Country Files on Intangible Cultural Heritage, *UNESCO, Paris*, 2005–2023.
- UNCTAD, Traditional Knowledge, Innovations and Practices: Background Note and Policy Options, UNCTAD Discussion Paper, *United Nations, Geneva*, 2019.
- Geographical Indications Registry, *Annual Report 2023–2024*, Office of the Controller General of Patents, Designs & Trade Marks, *Ministry of Commerce & Industry, Government of India, Chennai*, 2024.
- Adebola T, The social and solidarity economy of African geographical indications, *African Journal of International and Comparative Law*, 27 (3) (2019) 263.
- Calboli I, Geographical indications of origin at the crossroads of local development, consumer protection and marketing strategies, *International Review of Intellectual Property and Competition Law*, 48 (6) (2017) 615.
- Adebola T, The legal construction of geographical indications in Africa, *Journal of World Intellectual Property*, 26 (4) (2023) 211.
- WTO, Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS), Marrakesh Agreement Establishing the WTO, Arts. 22–24, *WTO Legal Texts, Geneva*, 1994.
- Geographical Indications of Goods (Registration and Protection) Act, 1999, *Government of India, Ministry of Commerce & Industry, New Delhi*, 1999.
- Rangnekar D, Re-Making Place: The Social Construction of the Geographical Indication of Feni, *Environment Plan A*, 42 (12) (2010) 2874.
- DPIIT, One District One Product — Policy Note and Implementation Guidance, Ministry of Commerce & Industry, *Government of India, New Delhi*, 2018 (revised 2022).
- Bahl K, Geographical indications and development: Evidence from Asia, *Journal of World Trade*, 53 (4) (2019) 567.
- Intellectual Property India, How to File a GI Application — Applicant Guide and Forms, Office of the Controller General of Patents, Designs & Trademarks, *Chennai*, 2020 (revised 2023).
- TRIFED, Annual Report 2020–21, Ministry of Tribal Affairs, *Government of India, New Delhi*, 2021.
- Rangnekar D, Re-Making place: The social construction of the geographical indication of Feni, *Environment Plan A*, 42 (12) (2010) 2874.
- Bramley C & Biénabe E (eds.), Developing Geographical Indications: A Practical Handbook, *Routledge, London*, 2014.
- Tea Board of India v ITC Ltd.*, case commentary on Darjeeling GI litigation, Supreme Court & tribunal summaries, various reports (2011).
- National Handicraft Centre (Zimbabwe), Ndebele Beadwork: Project Report and Training Manual, *Harare*, 2022.
- Gangjee D, Proving provenance? geographical indications certification and its discontents, *World Dev*, 98 (2017) 12.
- Chen L, Community Governance and Traditional Knowledge Protection, *China Q*, 220 (2014) 960.
- Geographical Indications Registry, *Annual Report 2023–2024*, Office of the Controller General of Patents,

- Designs & Trade Marks, Ministry of Commerce & Industry, *Government of India, Chennai*, 2024.
- 35 ARIPO, Protocol on the protection of geographical indications, *African Regional Intellectual Property Organization*, Harare, 2015.
  - 36 Singh N & Bose R, Data Sovereignty and indigenous consent: Legal challenges in digitising TK, *Journal of Technology Law & Policy*, 9 (1) (2022) 55.
  - 37 DPIIT, One District One Product — Policy Note and Implementation Guidance, Ministry of Commerce & Industry, *Government of India, New Delhi*, 2018 (revised 2022).
  - 38 WIPO, Proceedings of the WIPO Worldwide Symposium on Geographical Indications 2023, *WIPO, Geneva*, 2023.
  - 39 WIPO, World Intellectual Property Indicators 2023, *WIPO, Geneva*, 2023.
  - 40 Adeney E, The moral rights of indigenous artists: A comparative analysis, *Intellectual Property Q*, 3 (2016) 214.
  - 41 TRIFED, Field Impact Studies: Van Dhan and GI Interventions 2016–2023, TRIFED Research Unit, New Delhi, 2017–2023.
  - 42 van der Kamp M T M, Certification, collective marks and geographical indications: European origins and African potentials, *Journal of Intellectual Property Law & Practice*, 14 (5) (2019) 366.
  - 43 WIPO, Geographical Indications: An Introduction, 2<sup>nd</sup> edn., WIPO Publication No. 1234, *WIPO, Geneva*, 2021.
  - 44 Sharma R & Venkatesh S, Collective ownership and enforcement outcomes: An empirical study of Indian GIs, *Economic Political Weekly*, 58 (32) (2023) 22.
  - 45 UNCTAD, Trade and Development Report 2022, United Nations, Geneva, 2022.
  - 46 Ministry of Commerce & Industry/DPIIT, Blockchain Traceability for GIs — ODOP Pilot Project Report, *Government of India, New Delhi*, 2022.
  - 47 Geographical Indications Registry, Annual Report 2023–2024, Office of the Controller General of Patents, Designs & Trade Marks, Ministry of Commerce & Industry, *Government of India, Chennai*, 2024.
  - 48 WIPO, Geographical Indications: An Introduction, 2<sup>nd</sup> edn., WIPO Publication No. 1234, *WIPO, Geneva*, 2021.
  - 49 National Handicraft Centre (Zimbabwe), *Ndebele Beadwork: Project Report and Training Manual*, Harare, 2022.
  - 50 Scotford E, *Regulating the Cultural Economy: The Rise of Heritage-Linked IP*, *Modern Law Review*, 83 (3) (2020) 555.
  - 51 Ministry of Tribal Affairs, Statistical Profile of Scheduled Tribes 2010–2024, *Government of India, New Delhi*, 2010–2024.
  - 52 ARIPO, Protocol on the protection of geographical indications, *African Regional Intellectual Property Organization*, Harare, 2015.
  - 53 Rivera Cusicanqui S Z, Decolonising the Margins: Indigenous Knowledge and Legal Pluralism in the Global South, *Journal of Peasant Studies*, 41 (5) (2014) 727.
  - 54 TRIFED, Annual Report 2020–21, Ministry of Tribal Affairs, Government of India, New Delhi, 2021.
  - 55 Selected GI judgments — *Kancheepuram Silk Manufacturers' Assn. v State of Tamil Nadu; Banaras Brocades v X*, High Court decisions on GI infringement, 2018–2022.
  - 56 Adebola T, The social and solidarity economy of african geographical indications, *African Journal of International and Comparative Law*, 27 (3) (2019) 263.
  - 57 WIPO Lex, Consolidated Text — Geographical Indications of Goods (Registration & Protection) Act, 1999 (*India*), *WIPO, Geneva*, accessed 2024.
  - 58 Geographical Indications Registry, Annual Report 2010–2011, Office of the Controller General of Patents, Designs & Trade Marks, *Ministry of Commerce & Industry, Government of India, Chennai*, 2011.
  - 59 WIPO Traditional Knowledge Division, Biocultural Protocols and Community Intellectual Property Charters — Practical Guidance, *WIPO, Geneva*, 2018.
  - 60 Idelani C, The Political Economy of African IP Harmonisation: Lessons from ARIPO, *African Journal of Economic Review*, 8 (1) (2020) 130.
  - 61 WIPO, Geographical Indications — Selected Highlights and Data 2024, *WIPO Statistical Briefing, Geneva*, 2024.
  - 62 WIPO, World Intellectual Property Indicators 2023, *WIPO, Geneva*, 2023.
  - 63 Mehta S K, Geographical Indications, Customary Norms and Community Governance, PhD thesis, *National Law University*, 2021.
  - 64 Patel M & Roy A, Registration growth and enforcement correlation: A quantitative assessment of GI registries, Research Policy Working Paper No. 45, University Research Press, 2022.
  - 65 Rao S, Civil Versus Criminal Enforcement under the Indian GI Regime, *Indian Journal of Law and Society*, 12 (4) (2021) 201.
  - 66 Mensah A & Okoye L, Customary Law and Intellectual Property: Integrating Community Norms into National GI Frameworks, *African Journal of Legal Studies*, 18 (1) (2021) 86.
  - 67 BRELA, Makonde Carvings — National GI Initiative: Country Report, Tanzania Business and Intellectual Property Authority, Dodoma, 2021.
  - 68 ARIPO Secretariat, Administrative Guidelines for GI Applications and Implementation, *ARIPO, Harare*, 2016 (revised 2021).
  - 69 Adeyemi O, Regional Harmonisation and the ARIPO GI Protocol: Legal and Institutional Challenges, *African Intellectual Property Journal*, 7 (2) (2022) 99.
  - 70 TRIFED, *Annual Report 2020–21*, Ministry of Tribal Affairs, Government of India, New Delhi, 2021.
  - 71 Blakeney M, Protecting traditional knowledge and traditional cultural expressions under intellectual property law, *Queen Mary Journal of Intellectual Property*, 5 (1) (2015) 3.
  - 72 Rodriguez L, Geographical Indications, Cultural Rights and Decolonising IP, *International Journal of Cultural Property*, 30 (1) (2023) 1.
  - 73 Srinivas T (ed.), Handicrafts, Identity and Intellectual Property in India, *Orient Blackswan*, New Delhi, 2016.
  - 74 Twarog S & Kapoor P (eds.), Protecting and promoting traditional knowledge systems: National experiences and international dimensions, *World Bank & Routledge*, Washington DC/London, 2018.
  - 75 ARIPO Secretariat, ARIPO Annual Bulletin 2019–2024 and GI Bulletins, *ARIPO, Harare*, 2015–2024.

- 76 Chatterjee K, Geographical indications and rural artisanship in India: Enforcement and outcomes, *Indian Journal of Intellectual Property Law*, 12 (2) (2019) 45.
- 77 Geographical Indications of Goods (Registration and Protection) Act, 1999, Government of India, Ministry of Commerce & Industry, New Delhi, 1999.
- 78 Gangjee D, Relocating the law of geographical indications, *Cambridge University Press*, Cambridge, 2012.
- 79 López C, Indigenous Groups and Intellectual Property: Assessment of Community-Based Protection Models, *Journal of Human Rights*, 20 (4) (2021) 455.
- 80 Adebola T, The social and solidarity economy of african geographical indications, *African Journal of International and Comparative Law*, 27 (3) (2019) 263.
- 81 DPIIT, Guidelines and Procedures — Geographical Indications Registry, *IP India Circulars and Notifications*, Ministry of Commerce & Industry, New Delhi, 2010–2024.
- 82 WIPO, World Intellectual Property Indicators 2023, *WIPO*, Geneva, 2023.
- 83 UNCTAD, Trade and Development Report 2022, *United Nations*, Geneva, 2022.