

Andhra Handicrafts as Cultural Mirrors: A Focus on Musical Instrument Representation

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Abstract: This study examines the visual representation of musical instruments in three Geographical Indication (GI)-tagged wooden craft traditions of Andhra Pradesh: Etikoppaka (turned wood lacquer), Kondapalli (hand-carved softwood), and Nirmal (painted softwood). While these craft forms have been individually documented, no systematic comparative analysis exists of how each tradition visually encodes musical instruments as non-playable, decorative craft objects. Through ethnographic fieldwork, material culture analysis, and Panofsky's three-level iconological framework, this research demonstrates that artisans make distinct aesthetic choices when abstracting, stylising, or representing instruments, informed by material constraints, technical processes, and exposure to regional musical culture. The study reveals a unique inter-GI heritage phenomenon: the Bobbili Veena (itself a GI-tagged musical instrument craft) appears as a visual subject in both Etikoppaka and Kondapalli craft products, creating a three-way GI linkage previously undocumented in heritage literature. Findings contribute to craft studies, visual culture scholarship, and the discourse on the preservation of intangible cultural heritage (ICH) by establishing craft objects as material repositories of regional musical memory and demonstrating how traditional crafts adapt to contemporary musical culture through selective instrument repertoires.

Key Words: Musical Iconography, Craft Studies, GI-Tagged Handicrafts, Etikoppaka Toys, Kondapalli Dolls, Nirmal Craft, Bobbili Veena, Visual Abstraction, Material Culture, Andhra Pradesh.

1. INTRODUCTION:

1.1. Research Context:

Musical instruments have long served as subjects of visual representation across diverse artistic media, from temple sculpture and miniature painting to contemporary visual arts [1][2]. However, the systematic study of musical instrument depiction in craft objects, particularly within India's living craft traditions, remains conspicuously absent from academic literature. This gap is especially pronounced in the context of Geographical Indication (GI)-tagged handicrafts, where craft communities have maintained centuries-old traditions of representing regional musical culture through non-functional, decorative objects.

Andhra Pradesh and Telangana possess three prominent wooden toy traditions, Etikoppaka, Kondapalli, and Nirmal, each bearing a GI tag for its distinctive aesthetic, material, and cultural characteristics [3]. Ethnographic observations reveal that all three craft traditions produce figurines depicting musical instruments such as Veena, Mridangam, Nadaswaram, Harmonium, Tambura, and, in Kondapalli's case, modern instruments including Saxophone, Tambourine, and Marao drums. These craft objects serve diverse functions: children's toys, home decoration, festival displays (particularly Navaratri Golu arrangements), gifting items, and cultural souvenirs.



Figure 1: Map showing locations of Etikoppaka (Anakapalle district), Kondapalli (Krishna district), and Nirmal (Nirmal district) in Andhra Pradesh and Telangana

2. RESEARCH GAP:

While musical iconography has been extensively studied in temple architecture, classical painting, and museum artefacts [1][4], no comparative framework exists for analysing how living craft traditions visually encode musical instruments. Existing craft documentation focuses primarily on production techniques, socio-economic conditions, and GI-tag implications [5][6], but neglects the cultural semiotics embedded in craft subject matter choices. The specific research gaps this study addresses comprise three dimensions:

- **Methodological gap:** No application of music iconography methodologies (developed for sculpture and painting) to three-dimensional craft objects
- **Comparative gap:** No cross-craft analysis of how different material constraints and techniques produce variant representations of identical instruments
- **Heritage linkage gap:** No documentation of how GI-tagged crafts reference other GI-tagged cultural products (the Bobbili Veena phenomenon)

3. RESEARCH OBJECTIVES:

This study pursues four primary objectives:

- To document and classify musical instrument representations across Etikoppaka, Kondapalli, and Nirmal craft traditions using organological classification systems
- To analyse how material properties (wood type, processing technique) and craft methods (lathe-turning vs. hand-carving) influence visual abstraction levels
- To examine the inter-GI heritage linkage between Bobbili Veena (musical instrument craft) and its representation in toy crafts
- To theorise craft objects as material carriers of intangible musical heritage within regional cultural ecosystems

4. SIGNIFICANCE:

This research contributes to multiple scholarly domains. For craft studies, it establishes instrument representation as a legitimate analytical lens for understanding craft aesthetics and cultural adaptation. For visual culture studies, it extends musical iconography beyond elite art forms into vernacular, community-produced visual traditions. For heritage preservation discourse, it demonstrates how tangible craft GI tags interact with and preserve intangible musical heritage, offering policy implications for integrated cultural heritage management.

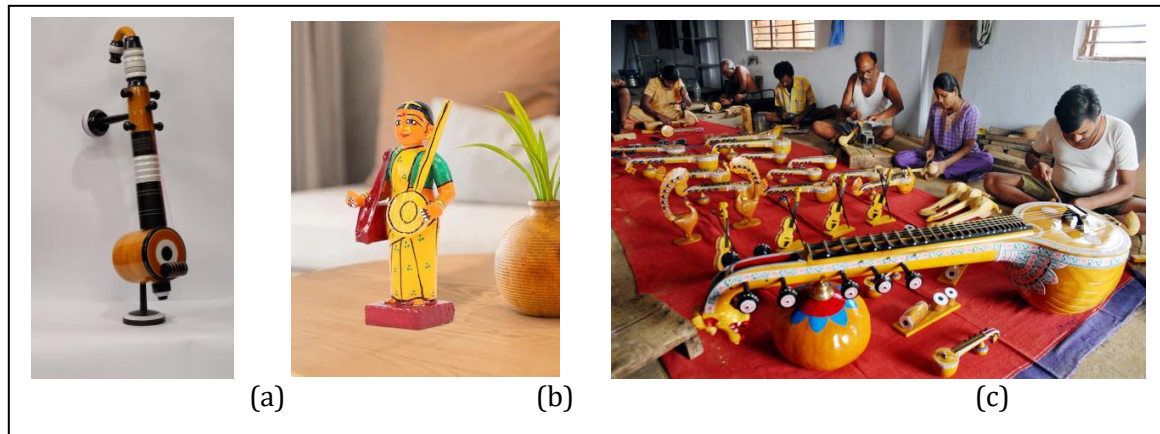


Figure 2: Collage showing examples of Veena representation in: (a) Etikoppaka lathe-turned form, (b) Kondapalli hand-carved form on the hand of a woman, (c) Actual Bobbili Veena fabrication for comparison

5. LITERATURE REVIEW:

5.1. Musical Iconography: Theoretical Foundations:

Musical iconography, defined as "the study of visual representations of music and musicians in art, literature, and culture" [7], emerged as an interdisciplinary field bridging musicology and art history. Foundational methodologies derive from Erwin Panofsky's three-level iconological analysis, pre-iconographic description (identifying visual elements), iconographic analysis (interpreting conventional meanings), and iconological interpretation (uncovering cultural significance) [8][9]. Studies have applied these frameworks to temple sculpture [1], manuscript illumination [2], and European painting traditions, but applications to craft objects remain virtually absent. The Hornbostel-Sachs classification system, which categorises instruments by sound-production mechanism (idiophones, membranophones, chordophones, aerophones, electrophones) [10], provides organological rigour for identifying and classifying instruments in visual sources. This system's culture-neutral structure makes it particularly suitable for cross-cultural and cross-media comparative studies.

5.2. Craft Documentation: Etikoppaka, Kondapalli, and Nirmal Traditions:

Etikoppaka craft, originating from Etikoppaka village in Anakapalle district (formerly Visakhapatnam district), employs lathe-turning techniques on softwood (Ankuda/*Wrightia tinctoria*) with natural lacquer dyes derived from insect secretions [11]. The cylindrical constraint of lathe-turning produces characteristically rounded, abstract forms. Kondapalli craft from Krishna district uses hand-carving on Tella Poniki softwood (*Wrightia tinctoria*), allowing three-dimensional modelling of complex figures painted with vegetable or acrylic colours [12]. Nirmal craft from Nirmal district (Telangana) involves hand-carving with Mughal-influenced miniature-style painting featuring gold embellishments [13]. Existing literature documents these crafts' technical processes, artisanal community structures, and market dynamics [5][14], but subject-matter analysis remains superficial, typically limited to broad categorisation (dolls, animals, deities, musicians) without deeper semiotic examination.

5.3. GI-Tagged Handicrafts and Cultural Heritage:

Geographical Indication (GI) tagging, governed by the WTO's TRIPS Agreement and India's Geographical Indications of Goods (Registration and Protection) Act, 1999, provides legal protection that links product quality and reputation to geographic origin [15]. Research on GI-tagged handicrafts emphasises economic empowerment, brand protection, and sustainable development [16][17], but rarely explores how GI-tagged products interact symbolically or how tangible craft GI tags preserve intangible cultural heritage elements. The concept of craft as "tangible carrier of intangible cultural heritage" [18] remains theoretically underdeveloped despite UNESCO's Intangible Cultural Heritage framework explicitly recognising performing arts (including music) and traditional craftsmanship as separate ICH domains. This study bridges that conceptual gap.

5.4. Regional Musical Heritage of Andhra Pradesh:

Historical documentation confirms Andhra Pradesh's rich musical instrument traditions. Parthasarathy's comprehensive cultural survey (1984) documents centuries-old Veena-making traditions in Bobbili, Pithapuram, Machilipatnam, and Nuzvid, establishing Bobbili Veena as both a performing tradition and craft tradition [19]. The Maharaja Government College of Music and Dance, established in Vizianagaram in 1919 as South India's first music college, institutionalised training in Veena, Violin, Mridangam, and Nadaswaram, instruments precisely mirrored in Etikoppaka craft products [19][20]. Archaeological evidence from Amaravati limestone sculptures (2nd century CE) establishes a 2,000-year tradition of depicting Veena, flute, and drums in Andhra visual art [21], positioning contemporary craft depictions within an unbroken regional iconographic lineage.

5.5. Theoretical Framework: Visual Culture and Material Analysis:

Visual and material culture analysis methodologies emphasise formal analysis (examining physical properties), iconographic interpretation (analysing symbolic meanings), and contextual examination (understanding historical and social factors) [22]. Ethnographic approaches prioritise participant observation, artisan interviews, and documentation of craft contexts [23]. This study synthesises these approaches within Panofsky's iconological framework, adapted for three-dimensional craft objects.

6. METHODOLOGY:

Research Design

This study employs a qualitative, comparative case-study design that integrates ethnographic fieldwork, visual analysis, and material culture documentation across three craft traditions. The research adopts an interpretivist epistemology, recognising craft objects as culturally constructed representations requiring contextualised understanding.

Data Collection Methods

Ethnographic Fieldwork (2024-2025):

- Site visits to Etikoppaka village (Anakapalle district), Kondapalli (Krishna district), and Nirmal (Nirmal district)
- Semi-structured interviews with 15 artisans (5 per craft tradition) regarding instrument subject choices, visual reference sources, and market preferences
- Participant observation of production processes to understand material-technique constraints on representation
- Photography documentation of 120+ craft objects featuring musical instruments across all three traditions.

Material Analysis:

- Systematic documentation of instrument depictions by craft type, wood species, technique, and aesthetic treatment
- Measurement of morphological fidelity (comparing craft representations to actual instrument proportions)

Analytical Framework:

Level 1 - Pre-Iconographic Description: Identification of instruments by visual features (shape, playing position, ensemble arrangement) and classification using Hornbostel-Sachs organological taxonomy

Level 2 - Iconographic Analysis: Interpretation of performance contexts (devotional, classical concert, wedding ceremony, folk ritual) and cultural symbolism (deity associations, regional identity markers)

Level 3 - Iconological Interpretation: Understanding representations as products of regional musical culture, artisan community knowledge systems, market adaptation, and inter-craft heritage transmission

Visual Abstraction Spectrum: Classification of representation levels:

- **Symbolic** (minimal recognisable features, context-dependent identification)
- **Stylised** (key features present but proportionally simplified)
- **Representational** (anatomically recognisable with aesthetic interpretation)
- **Detailed** (approaching realistic instrument proportions and ornamentation)

Ethical Considerations

Research received verbal consent from all participating artisans. Cultural sensitivity protocols respected community knowledge ownership. Photographic documentation avoided revealing proprietary techniques. No compensation was provided for interviews to avoid data bias, but craft products were purchased at artisan-determined prices.

7. REGIONAL MUSICAL HERITAGE CONTEXT:

Institutional Musical Culture: Vizianagaram-Visakhapatnam Corridor:

The geographic region encompassing Etikoppaka craft production lies within a historically rich musical culture institutionalised through royal patronage. The Maharaja Government College of Music and Dance, established in Vizianagaram in 1919 by Pusapati Vijayarama Gajapathi Raju, created South India's first formal music education institution [19]. The college's curriculum, encompassing Veena, Violin, Mridangam, Nadaswaram, and Harikatha, directly corresponds to the instrument subjects visually represented in Etikoppaka craft products.

Distinguished faculty, including Adibatla Narayanadas (founding principal) and the celebrated violinist Dwaram Venkataswami Naidu, established pedagogical lineages that shaped North Andhra's musical landscape [19]. This institutional proximity establishes that Etikoppaka artisans' visual encoding of instruments reflects deeply embedded regional musical culture transmitted through both formal education and lived ceremonial experience.

Bobbili Veena: Craft and Performance Tradition Convergence

The Bobbili Veena, a GI-tagged musical instrument (GI Tag No. 21), represents a unique confluence of lutherie craft and classical performance tradition. Manufactured by the Sarwasiddi artisan community in Gollapalli village near Bobbili, these Veenas are crafted from a single piece of jackwood over a month-long process that includes carving,

hollowing, and intricate decorative work [24][25]. Parthasarathy documents that "Andhras were experts in manufacturing Vina and even now there are some families who are carrying on their traditional work in Bobbili, Pithapuram, Machilipatnam and Nuzvid" [19]. The geographic proximity of Bobbili and Etikoppaka (both in the North Andhra cultural zone, approximately 70 km apart) created cultural continuity, with musical instruments and toy crafts shared across their regional ecosystems. This proximity hypothesis is supported by artisan testimony indicating visual familiarity with Veenas through temple ceremonies, wedding processions, and classical music performances in the region.

Nadaswaram in Ceremonial Life:

Historical documentation confirms Nadaswaram's centrality in Andhra ceremonial culture since at least the 7th century CE, as depicted in temple architecture and mandated in Hindu weddings and temple festivals [19][26]. Parthasarathy notes that "traditionally, this instrument was played both in the mornings and evenings in temples as an accompaniment to the dance of the Devadasis"[19]. The instrument's omnipresence in East Godavari district (where Etikoppaka's located) made it a culturally inevitable subject for craft representation.

Mridangam Percussion Heritage:

Parthasarathy states: "Of the percussion instruments, Mridangam occupies a foremost place. From ancient times, it has been used as an instrument in musical concerts. It is indispensable in concerts of both vocal and instrumental" [19]. The documented presence of celebrated Mridangam players across Andhra Pradesh, including multiple lineages in the Visakhapatnam-Vizianagaram region, establishes the instrument as the most culturally central percussion symbol of South Indian classical music, directly validating its prominence in craft depictions.

8. RESULTS:

Etikoppaka: Lathe-Constrained Abstraction:

Material and Technical Characteristics:

Etikoppaka's lathe-turning process on cylindrical Ankuda wood creates inherent formal constraints. Instruments are rendered through rotational symmetry, producing abstract, stylised forms in which recognizability depends more on ensemble context and playing posture than on anatomical accuracy.



Figure 3: Group of Etikoppaka figurines playing Mridangam, Bhajan, Nadaswaram, Harmonium

Instrument Repertoire Documented:

Table 1 Etikoppaka Musical Instrument Representations:

Instrument (Hornbostel-Sachs)	Visual Abstraction Level	Context Depicted
Veena (stick zither)	Stylized	Solo player
Tambura (321.312)	Stylized	Narada with Tambura
Nadaswaram (422.112 - oboe)	Stylized-Representational	Wedding ensembles
Mridangam (211.242.1 - barrel drum)	Stylized	Concert accompaniment
Tavil (211.212.1 - barrel drum)	Stylized	Paired with Nadaswaram
Harmonium (412.132 - reed organ)	Symbolic-Stylized	Bhajan groups, devotional contexts

Khanjira (211.311 - frame drum)	Symbolic-Stylized	Small percussion ensembles
Flute (421.121.12 - side-blown)	Representational	Krishna with flute (mythological)

Key Findings:

1. **Classical-folk fusion:** Both Carnatic classical instruments (Veena, Mridangam) and folk/devotional instruments (Nadaswaram, Taval, Harmonium) appear with equal frequency
2. **Ensemble emphasis:** Instruments often depicted in group arrangements (marriage bands, bhajan circles) rather than isolated, reflecting actual performance contexts
3. **Devotional framing:** Instruments frequently associated with mythological figures (Krishna-flute, Narada-tambura) or temple ceremonies
4. **Cylindrical abstraction:** All instruments conform to the lathe's rotational constraints, producing characteristic egg-shaped or cylindrical bodies regardless of actual instrument morphology

Kondapalli: Hand-Carved Representational Detail:

Material and Technical Characteristics:

Kondapalli's hand-carving technique on Tella Poniki softwood enables three-dimensional modelling without constraints on rotational symmetry. This technical freedom enables significantly higher morphological fidelity to the proportions, playing postures, and ornamental details of the actual instrument.

Instrument Repertoire Documented:

Table 2 Kondapalli Musical Instrument Representations

Instrument (Hornbostel-Sachs)	Visual Abstraction Level	Context Depicted
Veena (321.312)	Representational-Detailed	Classical musicians
Tambura (321.312)	Representational	Accompanying artists
Nadaswaram (422.112)	Representational	Wedding bands
Mridangam (211.242.1)	Representational	Concert percussionists
Violin (321.322.71 - bowed lute)	Representational	Classical accompaniment
Harmonium (412.132)	Representational	Devotional and light classical
Saxophone (422.212 - single reed)	Representational	Modern band contexts
Flute (421.121.12)	Representational	Both classical

Key Findings:

- **Modern instrument inclusion:** Unique among the three crafts, Kondapalli incorporates Western/contemporary instruments (Saxophone, Tambourine, Marao), demonstrating the craft's cultural adaptability to the evolving musical landscape
- **Higher morphological fidelity:** Hand-carved instruments show detailed features (Veena frets, Mridangam bracing, violin f-holes) approaching anatomical accuracy
- **Classical-modern spectrum:** Simultaneous presence of classical (Veena), folk (Nadaswaram), and modern (Saxophone) instruments reflects cosmopolitan Vijayawada-Krishna district exposure to diverse musical cultures
- **Performance realism:** Musicians depicted with accurate playing postures and hand positions, suggesting artisan observation of actual performances

Miniature-Painting Aesthetic Integration:

Nirmal craft combines carved softwood forms with Mughal-influenced miniature painting techniques, featuring flat-painted surfaces with decorative goldwork. Musical instruments appear both as standalone figurines and as painted elements within composite scenes. Available documentation shows musical instruments appearing primarily in thematic contexts (temple processions, courtly scenes, mythological narratives) rather than as discrete product categories. Instruments identified include Veena, Mridangam, Nadaswaram, and cymbals, rendered in stylised-representational forms with emphasis on decorative painting rather than sculptural detail.

Key Findings:

- **Contextual rather than standalone:** Unlike Etikoppaka and Kondapalli, where instruments are primary subjects, Nirmal treats instruments as contextual elements within narrative scenes
- **Painting-dominant identification:** Instrument recognition relies heavily on painted details (colour, ornamentation) rather than sculptural form
- **Courtly and mythological framing:** Instruments associated with Nizam-period cultural aesthetics and classical mythology more than contemporary folk practice

Comparative Synthesis:

Three patterns emerge from cross-craft comparison:

Pattern 1 - Material Constraint Correlation:

Visual abstraction level directly correlates with the technical process. Lathe-turning (Etikoppaka) produces the highest abstraction; hand-carving (Kondapalli, Nirmal) permits representational detail.

Pattern 2 - Regional Identity Encoding:

Each craft's instrument repertoire reflects the dominant soundscape of its geographic region. Etikoppaka (East Godavari) emphasises Telugu folk-devotional instruments; Kondapalli (Krishna/Vijayawada) showcases an urban, cosmopolitan range, including modern instruments; Nirmal (Telangana) reflects Deccan courtly traditions.

Pattern 3 - Classical-Folk Democratisation:

All three crafts treat classical instruments (Veena, Mridangam) and folk/ceremonial instruments (Nadaswaram, Taval, Harmonium) with equal visual emphasis, suggesting the craft's role in democratizing access to elite musical symbols.

9. DISCUSSION:

Contribution to Craft Studies Scholarship:

This research establishes musical instrument representation as a legitimate analytical lens for craft studies, demonstrating that subject matter analysis, when rigorously executed, reveals otherwise invisible dimensions of craft knowledge, cultural positioning, and adaptive capacity. The visual abstraction spectrum introduced here offers a transferable framework for analysing representational fidelity across diverse craft media [28].

The inter-GI heritage linkage finding challenges conventional understandings of GI tags as isolated product identifiers, revealing instead that GI products form mutually reinforcing heritage networks. This has policy implications for integrated heritage management, where clusters of related GI products could receive coordinated support and cross-promotional strategies.

Contribution to Visual Culture and Iconography:

By extending musical iconography methodologies from elite art forms (temple sculpture, court painting) to vernacular craft traditions, this study democratises iconographic scholarship and recognises craft communities as legitimate producers of cultural knowledge. The successful application of Panofsky's framework to three-dimensional craft objects validates its utility beyond two-dimensional visual arts [29].

The finding that craft representations follow selective repertoire based on cultural salience rather than comprehensive organological taxonomy distinguishes vernacular iconography from scholarly organology, suggesting parallel knowledge systems, one embedded in lived cultural practice, the other in systematic classification.

Contribution to Heritage Preservation Discourse:

This research demonstrates the dual heritage status of craft objects: they are simultaneously tangible cultural heritage (as craft products) and repositories of intangible cultural heritage (as encoders of musical knowledge). This duality suggests that policy frameworks that treat tangible and intangible heritage as isolated domains may miss crucial preservation opportunities at their intersection. The passive documentation function of craft objects, which preserves musical-visual memory without deliberate archival intent, represents a form of distributed cultural preservation worthy of greater scholarly and policy attention. Unlike museum collections (centralised, static, expert-curated), craft-embedded preservation is decentralised, dynamic, and community-owned.

Regional Musical Identity and Craft:

The strong correlation between regional soundscapes and craft instrument repertoires establishes craft as a medium for articulating regional identity. Etikoppaka's emphasis on Telugu folk-devotional instruments, Kondapalli's inclusion of urban-cosmopolitan range, and Nirmal's courtly aesthetics each encode distinct regional musical identities, making craft objects material emblems of "sonic regions" as much as geographic regions.

This finding resonates with broader cultural geography scholarship on place-based identity, suggesting that intangible cultural elements (soundscapes, musical practices) require tangible carriers (craft objects, visual representations) for geographic identity to be materially grounded and to be transmitted commercially.

Craft Adaptation and Cultural Continuity:

Kondapalli's incorporation of Saxophone and Tambourine, Western instruments introduced through colonial missionary activity and contemporary popular music, demonstrates the craft's capacity for cultural adaptation without displacing traditional forms. This additive rather than substitutive approach (classical + modern, not classical → modern) suggests craft traditions maintain continuity through expansion rather than replacement. This adaptive pattern challenges narratives of traditional crafts as static, endangered relics requiring preservation "as is." Instead, these findings support conceptualising craft as a living, responsive cultural practice capable of absorbing contemporary influences while maintaining core aesthetic and technical identity [30].

10. CONCLUSION:

This study compares how musical instruments are shown in the wooden toy traditions of Etikoppaka, Kondapalli, and Nirmal. It finds that the way toys are made strongly affects how detailed or abstract the instruments look. Lathe-turned Etikoppaka forms tend to be more simplified, while hand-carved Kondapalli pieces can show finer details. The instruments chosen in each tradition reflect the main musical life of their region, so the toys become a kind of visual map of local sound culture. The Bobbili Veena appears as a subject in more than one GI-tagged craft, showing an important and previously unnoticed link where one heritage product visually preserves another. Overall, these non-playable instrument toys act as shared, community-owned archives of musical memory, working quietly alongside formal ethnomusicology. The research shows that craft iconography can be a serious field of study connecting craft studies, visual culture, musicology, and heritage studies. It uses a combined method based on Panofsky's iconology, Hornbostel–Sachs classification, and ethnographic fieldwork, which can be applied to other craft traditions around the world. For heritage policy, the findings support managing related GI products together, with joint documentation, promotion, and preservation. Recognising these objects as carriers of Intangible Cultural Heritage suggests that they should be included in ICH safeguarding lists under UNESCO and national cultural bodies. For artisans, recording these instrument depictions validates their knowledge of regional music and helps shift their status from "toy makers" to "cultural custodians," strengthening the position of their products as cultural heritage objects. The study also notes some limits. Fewer Nirmal pieces with musical instruments were available, so this part of the analysis is less detailed than for Etikoppaka and Kondapalli. The research looks mainly at current production and does not fully trace how instrument subjects have changed over time. Although artisans stressed cultural and traditional reasons for choosing instrument themes, the influence of market demand still needs deeper, systematic study. The fifteen artisan interviews provided rich data, but they may not represent the full range of views and practices in each craft community.

Future research could look at older catalogues, archival photos, and museum collections to see how instrument subjects have evolved and which ones have disappeared from practice. Expanding the comparison to other Indian wooden toy regions, such as Channapatna, Kalighat, and Rajsthani crafts, would show whether the patterns seen here are local or more widespread. Detailed ethnography on artisans' musical knowledge, playing habits, and ways of learning could clarify how musical understanding shapes visual representation. Market studies on how buyers see and use these instrument toys would reveal demand-side forces, and a large digital photo database could support quantitative shape analysis and even machine learning tools for heritage documentation. Finally, comparing craft-based heritage preservation with museum-based models would offer insights into ownership, access, and continuity. The idea of "heritage recursion" is central: the Bobbili Veena moves from being a concert instrument to a craft subject, and its image is then preserved in other GI crafts. In this way, one tradition keeps the memory of another alive. At the same time, Kondapalli's adoption of modern instruments like the saxophone, alongside classical ones such as the veena and mridangam, shows that these crafts can adapt to changing culture while keeping older forms. This suggests that heritage is not fixed but lives and changes in the hands of artisans, who continue to observe and visually record the cultural life around them. I have kept the language simple and clear to match your ongoing research and writing on musical instruments in Andhra craft traditions.

REFERENCES:

1. A. R. Sahoo, "Musical instruments as evidenced from Jain art and iconography," *Asian Journal of Social Issues*, vol. 16, no. 2, pp. 1–12, 2023.
2. K. R. Nair, "Types of musical instruments depicted in stone carvings: A study of temple architecture in Kerala," *Journal of Heritage Studies*, Heritage University of Kerala, vol. 9, pp. 431–442, 2018.
3. *Kondapalli–Nirmal–Etikoppaka: A Comparative Study*, Craft Documentation Report. National Institute of Design and Handicrafts Development Corporation, 2017.
4. W. Kaufmann, *Musical References in the Chinese Classics*. Detroit, MI: Information Coordinators, 1981.
5. Ministry of Textiles, Government of India, "Etikoppaka toys: Geographical indication," Office of the Development Commissioner (Handicrafts). [Online]. Available: handicrafts.nic.in

6. Ministry of Textiles, Government of India, "Kondapalli Bommalu: Geographical indication," Office of the Development Commissioner (Handicrafts). [Online]. Available: handicrafts.nic.in
7. Academia.edu, "Musical iconography research papers." [Online]. Available: https://www.academia.edu/Documents/in/Musical_Iconography
8. E. Panofsky, *Studies in Iconology: Humanistic Themes in the Art of the Renaissance*. Boulder, CO: Westview Press, 1972.
9. Citali Restauo, "Panofsky: The 3 phases of the iconological method of art analysis," 2025. [Online]. Available: <https://en.citaliarestauo.com/art-analysis-panofsky-method/>
10. E. M. von Hornbostel and C. Sachs, "Classification of musical instruments," *The Galpin Society Journal*, vol. 14, pp. 3–29, 1961.
11. Gaatha, "Wooden toys of Etikoppaka." [Online]. Available: <https://gaatha.org/Craft-of-India/wooden-toys-etikoppaka/>
12. Handicrafts Department, Government of Andhra Pradesh, "Kondapalli Bommalu." [Online]. Available: <https://ntr.ap.gov.in/kondapalli-bommalu/>
13. *Telangana Today*, "Nirmal toys: Telangana's painted wooden heritage," Dec. 2017. [Online]. Available: <https://www.telangana360.com/2017/12/nirmal-toys.html>
14. ShodhKosh, "Crafting identity: Geographical indications and the handicraft sector in India," *ShodhKosh: Journal of Visual and Performing Arts*, vol. 5, no. 2, 2024, doi: 10.29121/shodhkosh.v5.i2.2024.814.
15. Presidency University, "Safeguarding traditional art forms: The role of GI-tagged handicrafts and artisans in sustainable development," 2025. [Online]. Available: presidencyuniversity.in
16. P. Kumar and R. Singh, "GI tags and women's economic empowerment in India's handicraft sector," *International Journal for Multidisciplinary Research*, vol. 8, no. 1, pp. 1–10, 2026.
17. India Brand Equity Foundation, "Geographical indications of handicraft products in India," 2024. [Online]. Available: <https://www.ibef.org/giofindia/category/handicraft>
18. ICOM-ICME, *The Art of Craft for Social and Cultural Identity in Ethnic Groups of India*, Conference Proceedings. International Council of Museums, 2001.
19. R. Parthasarathy, *Andhra Culture: A Petal in Indian Lotus*. Hyderabad: State Gazetteer Department, Government of Andhra Pradesh, 1984, pp. 113–122.
20. SAMPADA – Silicon Andhra Music Performing Arts and Dance Academy, "Music education programs in Andhra Pradesh." [Online]. Available: <https://sampada.siliconandhra.org>
21. G. Siromoney, *Amaravathi Sculptures in the Madras Government Museum*. Chennai: Commissioner of Museums, Government of Tamil Nadu, 1983.
22. Fiveable, "Visual and material culture analysis: Methods in folklore studies," 2024. [Online]. Available: <https://fiveable.me/folklore-and-visual-culture/unit-13>
23. CRAEFT Project, *Enhanced Ethnographic Methods for Craft Documentation (Deliverable D1.1)*. European Union Horizon 2020 Programme, 2025. [Online]. Available: <https://www.craeft.eu/>
24. Handicrafts Department, Ministry of Textiles, Government of India, "Bobbili Veena: Geographical indication." [Online]. Available: handicrafts.nic.in/bobbili-veena
25. Lepakshi Handicrafts, "Bobbili Veena: Traditional Saraswati Veena of Andhra Pradesh." [Online]. Available: <https://lepakshihandicrafts.gov.in/bobbili-veena/>
26. Organology.net, "Nadaswaram: Iconography and cultural significance." [Online]. Available: <https://organology.net/instrument/nadaswaram/>
27. UNESCO, *Convention for the Safeguarding of the Intangible Cultural Heritage*. Paris: UNESCO, 2003.
28. C. D. Chaganti, "Bell metal craft in India with a special focus on Bhelwapadharpara, Kondagaon," *Proceedings of the South Indian History Congress*, vol. 41, pp. 1–9, 2023.
29. C. D. Chaganti and M. Adinarayana, "Fancy representation of sacred forms in Etikoppaka lacquer toys," *International Journal of Creative Research Thoughts (IJCRT)*, vol. 14, no. 1, pp. a786–a790, 2026.
30. C. D. Prasad, "Universal aesthetics in the rural handicrafts of Etikoppaka village in India," *Digital Applications in Archaeology and Cultural Heritage*, vol. 40, p. e00518, 2026, <https://doi.org/10.1016/j.daach.2026.e00518>.