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Empowering Women Through Design: Revitalising Ulos Textiles for Interior Fabrics and Community Identity

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Abstract

This research explores women's empowerment through the revitalisation of Ulos weaving in Kampung Ulos, Lumban Suhi-Suhi, North Sumatra, Indonesia. Ulos, a Batak textile with deep cultural meaning, faces challenges from modernisation and reduced interest among younger generations. By combining design innovation and traditional craftsmanship, the study demonstrates how Ulos can evolve as both cultural heritage and a creative resource. As designer, the author and team developed interior design applications, while weaving was executed by local craftwomen artisans, ensuring both authenticity and transformation.

Findings reveal that applying Ulos in contemporary interior furnishings elevates women's roles as artisans and entrepreneurs, fostering cultural pride, resilience, and intergenerational continuity in co-creation design. Beyond economic benefits, weaving sustains identity and extends Batak cultural narratives globally. Women-led weaving, supported by contemporary design innovation, proves Ulos is a living heritage adaptable to modern contexts.

Keywords: *Cultural Sustainability, Interior Fabrics, Sense of Place, Ulos Weaving, Women Empowerment.*



Introduction

Women have historically played crucial roles in preserving and evolving cultural heritage through craft practices. In Indonesia's Batak culture, the weaving of Ulos exemplifies how women sustain traditional knowledge while reinforcing community identity. Yet, their contributions often remain under-recognised in cultural and design discourses (Brogan & Dooley, 2024; Nugroho et al., 2021; Simbolon et al., 2022).



Figure 1. The View to Lake Toba (left) and The Tourism Village, Kampung Ulos Lumban Suhi-Suhi, Sumatera near Lake Toba (Right). Source: Private Document, 2024.

In the context of Ulos weaving, women artisans in villages such as Lumban Suhi-Suhi face social and economic challenges. Brown and Vacca (2022) describe craftsmanship as an evolving knowledge system, highlighting how Ulos weaving negotiates tradition and modernity. The revitalisation of Ulos as an interior fabric offers financial benefits while affirming cultural pride (Guo & Ahn, 2023; Simbolon et al., 2022). Once limited to ritual functions, Ulos is now adapted for contemporary use, improving both quality and marketability. This positions traditional crafts not as relics but as dynamic contributors to modern narratives (Nugroho et al., 2021; Simbolon et al., 2022).



Figure 2. The woven Ulos Fabrics as one of the traditional ceremony materials (Left) and the woman weaver (right). Source: Private document, 2024.

Through education, design, and community engagement, women-led initiatives in Ulos weaving demonstrate how cultural heritage can be sustained while shaping future identities (Brown & Vacca, 2022; Guo & Ahn, 2023).

Background and Context

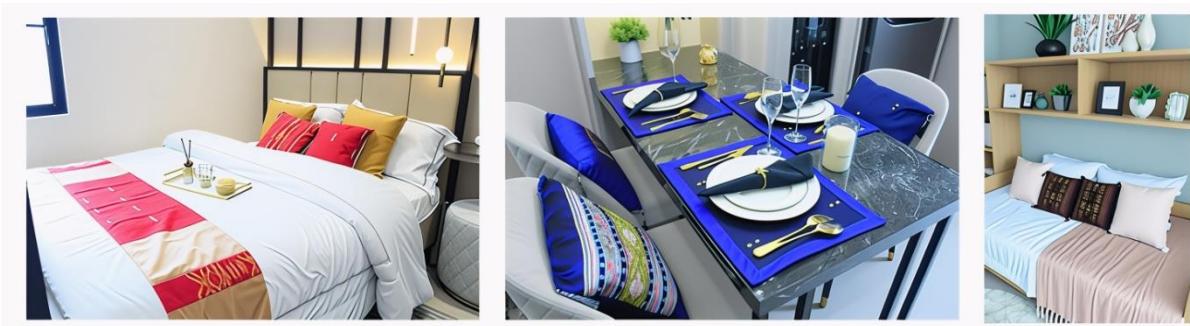
Ulos holds deep symbolic meaning in Batak society. Traditionally used in rituals marking birth, marriage, and death, it functions as

both material culture and social identity. Women in Lumban Suhi-Suhi have preserved this heritage through generational transmission of skills (Jiniputri et al., 2021; Simbolon et al., 2022). However, modernisation poses threats. Urban migration and mass-produced textiles reduce interest among younger generations (Shafi et al., 2019).

Economic viability remains another obstacle, as weaving alone rarely sustains households. Yet, reimagining Ulos as interior design fabric enables women to expand markets and reclaim agency (Jiniputri et al., 2021; Simbolon et al., 2022). Collaborative initiatives with academics encourage innovation while retaining traditional motifs (Valentine et al., 2017). Education and design exchanges further enhance the relevance of Ulos, revitalising its cultural and economic role. Thus, Ulos operates as both ritual artefact and living medium that reinforces place identity.

Ulos for Interior Fabrics

The adaptation of Ulos for interior fabrics bridges tradition and design innovation. Its geometric patterns and rich motifs suit contemporary aesthetics, making it versatile for furnishing and architectural installations (Atifah N Tarigan & Andrea, 2020; Nugroho et al., 2021). Integrated into interiors, Ulos transmits cultural narratives, creating spaces that embody tradition



and modernity (Simbolon et al., 2022).

Figure 3. The result of interior furnishing from Ulos, the traditional woven fabric. Ulos fabric transforms interiors with cultural beauty, refined craftsmanship, and a touch of Indonesian heritage. Source: Private Document, 2024.

Sustainability strengthens this transformation. Reliance in local materials reduces dependence on imports (Nugroho et al., 2021). Practices such as repurposing leftover threads and incorporating recycled materials align weaving with global sustainable design standards (Alimin et al., 2022; Indrie et al., 2023). The balance of craft and ecological innovation supports local economies while enriching cultural expression (Jiniputri et al., 2021).



Figure 4. Ulos fabric reimagined in modern interiors. From living spaces to dining tables and bedrooms, each piece brings cultural warmth, craftsmanship, and timeless elegance into contemporary homes. Source: Private Document, 2024.

Integration into design elevates artisans' recognition and embeds Batak identity within modern architecture. Collaborative education and design projects ensure continuity and innovation (Jiniputri et al., 2021). Cultural tourism enhances these efforts, as visitors admire weaving practices and support artisans, positioning Ulos as a symbols with regional and global resonance.

Case Insight from Field Observation

Fieldwork in Lumban Suhi-Suhi emphasises women's central role in weaving. Interviews reveal that weaving is often seen as spiritual practice linked to patience, familial duty, and self existence. Women express pride in preserving heritage while acknowledging economic pressures.

Collaborative design projects have introduced new product lines, interior accessories, and lifestyle goods co-created with designers. These projects diversify income and inspire innovation. Younger women, once reluctant to weave, now see its potential value as peers gain recognition.

Empowerment through design is both tangible and aspirational: it provides income and markets while also building confidence, agency, and visions for the future. Weaving thus functions as a cultural and development force, positioning women as artisans, innovators, and custodians of heritage.

Discussion

The intersection of design, empowerment, and cultural identity offers lessons for global practice. The Ulos case shows that heritage textiles can be repositioned in design industries without losing cultural meaning. Heritage is not static; through design, it evolves and engages new audiences. Women weavers emerge as transmitters of culture, entrepreneurs, and leaders.

The challenge lies in balancing authenticity and innovation. Empowerment emerges not by imposing new aesthetics but through co-creation that respects tradition while expanding opportunities.

Conclusion and Future Opportunities

This article demonstrates how design empowers women in Lumban Suhi-Suhi by revitalising Ulos weaving for interior use. Innovation generates economic opportunities, cultural pride, and strengthened identity.

Future prospects include digital platforms, training programs, and exhibitions that connect artisans to global markets while ensuring sustainability. As Ulos continues to evolve, it may inspire design languages that balance heritage and modernity. Ultimately, women's empowerment through design transcends textiles. By weaving

together tradition, innovation, and identity, women artisans illustrate how design can shape inclusive, sustainable, and culturally resonant future.

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Archana Shekara is a Professor of Graphic Design, the Harold Gregor Endowed Professor of Art, and Creative Director of Design Streak Studio, a research-based social innovation lab at Illinois State University. Shekara's design research interests and scholarship encompass cultural identity, design for belonging, social justice, and community engagement. As an Indian-American socio-cultural design researcher, she explores transnational identity and decoloniality through a brown cultural lens, using ethnographic narratives to foster critical awareness. Her creative practice spans type design, participatory experiences, and interactive installations that incorporate mixed and emerging digital media to evoke multi-sensory engagement. Her scholarship has been featured in several national and international exhibitions, publications, and conferences, including AIGA's *One Designer, One Work*. She has been invited to

speak at various universities across India, China, and the United States, and was the keynote speaker at the 2025 Typography Day Conference at the Indian Institute of Technology (IIT) Mumbai. She is also the founder and chair of the South Asian Design Educators Alliance (SADEA), a global platform dedicated to advancing South-Asian design histories, pedagogies, and perspectives.

Seva in the Kitchen: Mysuru Masale Dosai as Relational Design, Embodied Memory, and Generational Inheritance

Archana Shekara

Abstract

This article explores Mysuru Masale Dosai as a cultural love language rooted in memory, care, and generational continuity. Drawing on personal experience and ethnographic observation, it highlights cooking as a form of seva — care enacted through hands-on engagement, sensory attention, and attentive labor. Recipes function as adaptive systems, guided by intuition, inherited gestures, and environmental constraints rather than fixed measurements. In diasporic contexts, cooks navigate ingredient substitutions, technological tools, and modified fermentation methods while preserving flavours, textures, and lineage. Language, gesture, and rhythm act as vehicles of memory and pedagogy, transforming domestic labor into shared care, collective healing, and intergenerational learning. Framing cooking as a form of design expands the field to include intimate, sensory, and adaptive practices that sustain heritage, identity, and belonging, demonstrating how the kitchen mediates memory, care, and cultural survival.

Keywords: *Food Design, Familial Stories, Co-creation, Cultural Identity, Adaptation, Seva*

Introduction

Across cultures globally, food operates as a medium of care, memory, and relational connection. Cooking, for me, embodies seva — giving without expectation, an ethic of attentiveness and hospitality that renders love and joy tangible. Mysuru Masale Dosai offers a lens into relational and cultural practice, with the kitchen functioning as a dynamic design system where embodied knowledge, sensory engagement, and familial rhythms converge. In diasporic contexts, these practices reveal how migration reframes culinary adaptation while sustaining intergenerational continuity, offering insights into food as a site of design, identity, and belonging.

Kitchen as Relational and Sacred Space

The kitchen is a lived environment where memory, labor, and social relationships intersect. Ingredients, tools, and gestures carry generational knowledge, learned through observation and repetition. Preparing Mysuru Masale Dosai — spreading thin batter in circular motions to create peaks and valleys using a ladle on a hot *tava* (griddle), layering *kempu kara* (red spicy) chutney, golden potato *palya* (masala), and *benne* (butter) — is both a culinary and relational performance. Monday evening *dosai* prepared by *Amma* (mother) in the family home in Mysuru, for instance, becomes a weekly ritual of togetherness, signalling care and presence beyond the immediate act of eating.

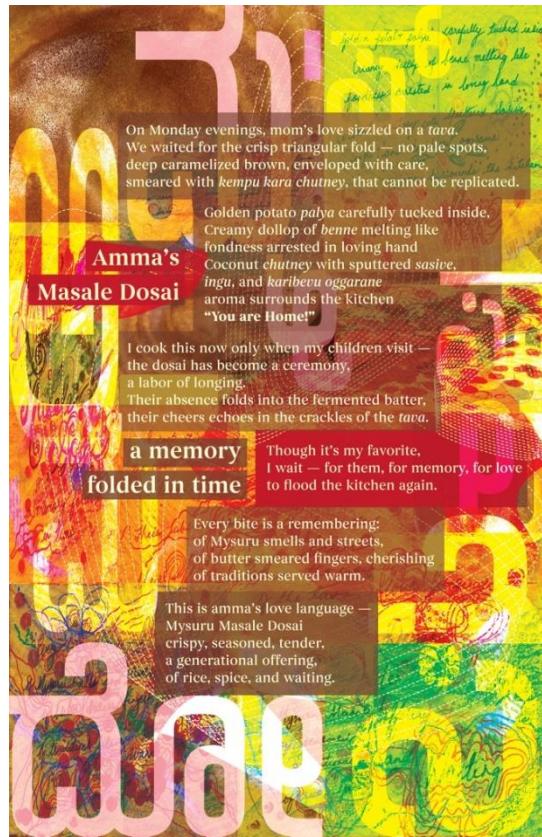


Figure 1: "Amma's Masala Dosai: A Memory Folded in Time" – I wrote the poem and designed this poster as a cherished expression of love, a keepsake that preserves memory. Design Credit: Archana Shekara

Cooking becomes an emotional labor: performing care through sensory attention when family is present and enacting longing when absent. In diasporic kitchens, these layers of memory gain intensity. Cooking for family who have traveled far becomes an act of holding them close. The fragrance *Oggarane* for the chutney, the crackle of, the gentle folding of the *dosai* – all become bridges across distance, carrying longing, presence, and love.

Sensory Knowledge and Adaptive Design

Preparing the batter for Mysuru Masale Dosai is a tactile, body-centred practice. Grinding rice and dal on a granite stone establishes

a rhythm the hands learn through repetition — how much pressure to apply, when to add water, and when the texture feels just right. Allowing the batter to ferment overnight fills the kitchen with the distinct aroma of fermentation and signals readiness through its light, aerated consistency, yielding crisp, golden. The distinctive red *kara chutney* transforms the *masale dosai* into what is known as the “Mysuru special.” *Byadgi menasu* (red chilies) are soaked and ground with spices and tamarind to achieve its deep colour and balanced heat. This chutney is then spread across the *dosai* according to individual preference sparingly or generously, depending on one’s tolerance for spice. A portion of *palya* (potato filling) is placed in the centre before the *dosai* is folded into a roll, a half, or even a cone. Alongside, the coconut chutney is prepared, followed by the *oggarane* (tempering) of mustard seeds, asafoetida, and curry leaves, releasing an aroma that guides the cook more reliably than any written instruction. These gestures are inherited and transmitted through embodied memory — they live in the hands, not on paper.



Figure 2: "Amma's Oggarane: Taste Comes Alive" — A design work capturing the onomatopoeia of tempering, illustrating the sizzling and crackling of spices in ghee. Design Credit: Archana Shekara

Recipes in the kitchens function as adaptive systems rather than fixed formulas. “A handful,” “the size of your palm,” “until it smells right” — these measures are grounded in sensory experience, intuition, and care. At participatory design events, attendees are often surprised to see me cook without measurements, yet tasting confirms the flavours are balanced. To pass down generational recipes, I invite my children to cook alongside me. Initially skeptical, they are learning to feel ingredients and adjust intuitively, much like working with adaptive and reciprocal design materials.

In diasporic contexts, adaptation is constant. When I arrived to the United States in 1991, I had to substitute the aromatic long grain jasmine rice for medium grain sona masoori, frozen coconut replaced fresh, and store-bought vegetables took the place of seasonal produce. These adjustments altered flavour and authenticity but did not dilute intention; they demonstrated how culinary design is iterative and responsive, guided by memory, environment, and care.

The large hand-operated stone grinder in my *Aggis'* (grandmother) kitchen was more than a tool — it carried rhythm, touch, and time. Ingredients passed down through generations, gestures learned through observation, and sensory memory all inform the practice of making *dosai*. Kitchens are sacred spaces because they embody lineage, where attention and care are exercised, relationships are nurtured, and memory becomes tangible. Many South Indian households rely on motorised grinders or powerful blenders to prepare *dosai* batter. My *Amma* replaced the stone grinder for

convenience, yet my *Aggi* insisted the taste was different — as our native tongue remembers, it is the guardian of memory and flavour. I have also observed that many diasporic South Indian households in the United States negotiate the fermentation process carefully. *Dosai hittu* (batter) that was once left covered outside for eight to ten hours now often must be stored in the oven with the bulb on in colder climates so it rises to become fluffy and airy. Despite these technological conveniences, such practices preserve the aromas, textures, and techniques that evoke ancestral homes and sustain familial traditions.

Language, Gesture, and Cultural Expression

I have made a conscious effort to keep our native language, Kannada, alive at home. Preserving language is a deliberate act, because when language thrives, culture endures. I have witnessed the loss of ancestral cultural identity as people migrate — many either assimilate or struggle to survive, often compromising their native stories. Protecting these stories ensures that future generations can embrace and connect with their heritage.

Kannada flows through my kitchen in a blend of Kanglish (Kannada and English). Words like *rasam*, *uppu*, *hittu*, *oggarane*, and *anna* carry layered meanings that resist direct translation. Recipes are rarely written; they are narrated and retained in the mind through rhythm, timing, and gesture. This multilingual flow sustains cultural continuity, affirming that diasporic identity is layered, evolving, and deeply connected — a legacy I can pass to my children, just as my *Amma* passed it to me.



Figure 3: "The Kitchen Holds Memory as its Tools" — A design collaboration with my family for Dialogues & Dishes.

Art & Design Credit: Archana Shekara, Swapna Srikanth, Aniruddha Shekara, Aishwarya Shekara

Conclusion

Cooking together transforms domestic labor into shared care. Mysuru Masale Dosai is more than a recipe, it is memory, lineage, and design embodied through dedicated practice. Grinding, stirring, tasting — each act teaches empathy, attentiveness, and presence. Meals become opportunities to connect, listen, and share stories. The kitchen becomes a site of collective healing, a space where family, memory, and identity intersect. It is about care, continuity, and belonging.

In the United States, ingredient scarcity reshaped what we cooked, but not its meaning. Rice, lentils, coconut, and vegetables changed in form and availability, yet memory and intention endured. As the

South Indian population grew, so did the number of Indian grocery stores, restoring access to familiar ingredients. In diasporic contexts, the kitchen mediates adaptation, longing, and connection. Recognising cooking as a form of relational design and seva expands our understanding of design itself — to include sensory, emotional, intergenerational spaces that hold culture together. Within our kitchen, through time, we continue to design love, identity, and home.

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