Abstract
This paper presents a design research mediation process towards the sustenance of ancient weaving techniques in the Portuguese region of Almalaguês. It focuses on identity, traditions, knowledge and economic viability; actions comprise ethnography, archiving, design practices, and media and business strategies. The project subscribes to the need to “consider the ways in which we contextualise and process the past” (ECAH 2019), a duty to re-inscribe and re-purpose material, narrative and processual heritage in a World often geared towards dictated obsolescence. The case study at hand, Almalaguês, is a unique form of handweaving dating back close to a millennium. It embodies deep-rooted historical significance within deceptively modest aesthetics. Greco-Roman and flora/fauna motifs have been made into exceptionally durable tapestry and bedding material, often passed down through generations as heirlooms, mirroring a continuity of knowledge systems as well as material, human and social narratives defining the cultural landscape. However, this ancient craft faces an uncertain future beyond its current generation of aging practitioners: for decades now, it has seen a steady decline of markets and practice base, as artisans are ill-equipped to cope with the commercial realities of modern business. As a consequence, a wealth of traditional know-how is at risk of permanent loss. The project is thus working in ongoing close contact with Almalaguês practitioners in order to consensually explore and develop ways to calibrate the above ecosystem into viable and beneficial cultural, narrative and business stands. Furthermore, a model will be drafted for testing and implementation in further contexts.

Keywords: Design for Recovery, Industrial Ethnography, Heritage Crafts
Introduction: Contextualizing Media and Ageing in Contemporaneity vs. Convention

This paper presents a design research mediation process towards the sustenance of ancient weaving techniques in the Portuguese region of Almalaguês. It occurs within the scope of research project Anti-Amnesia: Design research as an agent for narrative and material regeneration and reinvention of vanishing Portuguese manufacturing cultures and techniques. This project is currently engaging with four case studies, all tied within the dilemma of tradition and contemporaneity, and as such, thus reflecting the broader motto of its host research unit, Unexpected Media Lab (LUME).

The primary aim of LUME is to recalibrate contemporary and traditional media towards attaining viability and common good. Its objectives are based on the understanding that technological progress is in requirement of a greater degree of critical inquiry and interpretation, and as such needs to be regulated and implemented more mindfully. The research unit, correspondingly, addresses a set of paradoxes and perplexities linked to the very concept of media, and envisions potentially unforeseen socio-cultural impacts and consequences of contemporary expressions while proposing new roles for dead and obsolete media within modern-day culture and society.

LUME argues that it is possible to etymologically decipher the term Media in relation to the term Heritage, with respect to preservation, inscription and intermediation. It is pertinent to note here that certain other terms such as Medium (as a course for materiality) and Mediation equally share this etymological origin. In the context of its research interventions, LUME accordingly leverages such inherent multidisciplinarity of the term Media to its advantage, and articulates strategies based on its utilisation as an interface for action-research endeavours including digital design and preservation, inter-mediation processes, resource enquiries, and remediation.

In a related manner, another key area of concern for the research unit is the perception of Ageing as a phenomenon. While a current scientific agenda tends to read Ageing as primarily physiological – as can be clearly evidenced from the plethora of contemporary exercises that regard the phenomenon as a technological challenge focused on human functionality – LUME’s take on the subject is that just as the human body ages, so do societies, paradigms, technologies, aesthetics, and collective memories. Likewise, just as the body itself perishes, cultural heritage and know-how may disappear irreversibly.

In this respect, LUME perceives design research as having a crucial role to play in contributing towards the preservation and reinvention of repertoires, sources, media and skills that have fallen prey to obsolescence. The incorporation of intuitive exploratory and interpretative intervention as key research constituents can additionally help recover and renew context and meaning amidst the ongoing blitz of technological advancement.

LUME thus outlines the following courses of action as its framework of engagement with the discourse:

• Deciphering and interpreting paradoxes and perplexities associated with contemporary social, cultural and folkloric manifestations.
• Capacitating citizens in their relational ambivalence with the vertigo of contemporary culture.
• Legitimising marginalised value systems and cultural/material production models.
• Calibrating contemporary media through project-based interventions that involve factors of accessibility, horizontality, expectation, geometry, narrative, speculation, and oneirism.
• Harmonising the occurring contextuality between the axiomatic aspects of design and their current relationship with unpredictable paradigm shifts.
• Developing active pedagogy into the study of multiple forms of wealth.

**Project Anti-Amnesia - Towards the recovery and reactivation of traditional knowledge**

Anti-Amnesia, one of LUME’s principal public funded research interventions in the field, is a design-based mediation process that is dedicated to the auscultation of the variety of challenges faced by purveyors of traditional knowledge and culture in the contemporary universe. The sustenance and viability of traditional making is perceivably in question at a time rife with volatility in economic, social and technological spheres, and amidst debates raging the world over on dilemmas between convention and contemporaneity, the slow but steady dissipation of associated communities and systems of knowledge bears a sense of impasse for those concerned.

In conjunction, the project observes that traditional making, in the form of small scale industries and artisanal cultures in Northern and Central Portugal may face extinction: on the one hand due to paradigm shifts on a global scale in terms of commerce and manufacturing, and on the other, as a result of relatively subjacent factors such as modern marketing strategies and a heightened rate of change of consumer preferences. In this respect, the project comprehends that any meaningful intervention cannot solely rely on arbitrary ‘blanket’ measures for the reactivation of the traditional knowledge in these contexts. Approaches have to be built upon on-the-ground intelligence that can help clarify the various tiers of complexity involved and reveal the associated sensitivities and apprehensions.

The project’s vantage points, respectively, are four traditional industry and craft practices that are typical to the North and Central regions of Portugal, namely: shoemaking, tilemaking, letterpress typography and handweaving. These particular industrial contexts have been selected in order to cover a broad spectrum of risk factors that may emerge as being associated with the ongoing capitulation of traditional making. As case studies, they synchronically depict a precarious current reality defined by an incompatibility with modern manufacturing protocols, however, they are also representative of inherent creative human enterprise whose value as a specialised art (and activity) is irreplaceable and enduring. In prospection, therefore, the project believes that this element forms an important quotient of the potential attributable to these practices and can ultimately help the industrial cultures transcend prevailing circumstances of adversity. The scenario thereby presents design research an opportunity to play an active role in orienting the traditional practices to carve out a distinctive niche in the landscape of modern-day industries. The corresponding
model of collaboration, if calibrated to be replicable and customisable, can inform other traditional entities similarly seeking reactivation.

**Almalaguês - Millenary weaving in times of planned obsolescence**

Despite its enduring longevity as a practice since the 11th Century (Gomes, 2018), the hand weaving textile craft of Almalaguês has remained fairly obscure beyond its traditional bastions of the villages of Almalaguês – its namesake and likely provenance – and neighbouring Anagueis, both of which are situated on the outskirts of the town of Coimbra in Central Portugal.

Gomes (2016, 2018), on the origins of this ancient practice, observes that the surrounding environs have in perpetuum held influence over its entity, affording suitable conditions for a weaving culture to come up and prosper. The region is known for its fertile river valleys and adjoining plains that once had a thriving production of linen and wool, and the craft’s proximity to established trade routes, both riverine and overland, brought new materials and cultural impresses, particularly to Coimbra, the region’s trade center.

Almalaguês, however, has had scarce cultural scrutiny in its history, a standing that is non-justifiable from the quality of workmanship, or the level of localised proliferation as evident. Gomes (2018) attributes this impassivity to the chaste aesthetics of the yarn whose raw tinge and texture can appear as withdrawing emphasis from the finer details of the weave, and instead, highlighting the fabric’s functional aspects. As a result, the craft has been conventionally designated as rural and quotidian, and thus marginalised by wealthier clientele (de Almeida, Chatterjee and Gomes, 2017), who would typically provide the cultural traction to other, more florid forms of tapestry, such as Persian rugs. Additional factors including the deeply folkloric nature, and a quintessential home industry identity may have also contributed to a locally circumscribed footprint, however, such perceptible divergence can be similarly held responsible for the craft’s distinctiveness in terms of features that act as cornerstones to its unique identity.

Almalaguês’s genuine antiquity can be gauged from its ancient motifs; however, the machinations of the rustic looms provide a starker evidence. Typically, Almalaguês handlooms have been configured to ensure weave robustness, a crucial selling features of the produced fabric. The manner in which the weave structure is arranged is simplistic and compact, however there is enough give for the weavers to apply their characteristic adornments known as ‘pulls’. Such nuanced warp and weft manipulations manifest in a stratiform where geometric, jacquard-like motifs rise over a regular two-ply base. To perceptive observers of the design of textile, Almalaguês’s proprietary approach to handweaving gives cues to times of simplex munditiis in terms of making and industries.

Products made from Almalaguês fabric, typically mats, rugs and bed cover, intrinsically relay an idea of endurance, which is central to the craft’s being. These are made to endure generations of use, an aspect of the craft that mirrors another enduring intergenerational hand over - that of Almalaguês’s customs and traditions between the women of a household. Although geographically limited, the microcosmic regional prevalence of the craft and its inseparable relationship with surrounding society and
environment showcases the transition of Almalaguês weaving from a vocation to an institution.

In current times, however, this millenary craftform has been facing an unprecedented situation of uncertainty. In recent decades, the weaving culture has suffered critical setbacks due to the effects of modernisation, with the influx of cheaper foreign-made mass produced goods decimating Almalaguês’s traditional markets. Consequently, the long-term economic viability of the practice has been called into question by younger generations of the weaving community, who were expected to have been perpetuating the craft, but have been forced to abdicate and pursue alternative sources of subsistence. Thus, the obligation to the continuity of Almalaguês’s historical, cultural, and technical legacy rests with the remaining generation of active practitioners, at a time when its importance to the regional cultural landscape is finally coming to light.

Conclusion: Design Research as a mediation process for the reactivation of traditional knowledge

Project Anti-Amnesia is working in ongoing close contact with Almalaguês practitioners in order to consensually explore and develop ways to calibrate this unique ecosystem into viable and beneficial cultural, narrative and business stands. Its integrated reanimation strategy operates on the inference that a design research based approach that leverages advantages as presented by contemporary Media related tools, can become a crucial mediating interface between the old and the new, towards ensuring a dignified recovery and reinstatement of elements associated with traditional practices such as Almalaguês. The concept of Media thus gains functionality in the form of:

- Means to rescue materials, documents, testimonies, and historical facts that may otherwise be lost or forgotten;
- A globally accessible platform for acknowledging the processes and protagonists of traditional industrial practices as heritage in themselves;
- A communication medium to relay the allegorical and historical values that are intrinsic to these contexts, towards arguing for their distinctive uniqueness in present times;
- Conditions for the prototyping exploratory designs aimed at the hybridisation of materials and aesthetics from the several study contexts towards obtaining new product and market prospects.
- A connecting thread between the protagonists of traditional industries, and universities, administrative bodies and start-up culture, within an environment collaboratively geared towards support and innovation.

The project’s conducted research, in this regard, is channelled to undergo a reversion of its various outcomes, on an ongoing basis, into multiple contexts of related socio-cultural appropriation through a “build-measure-learn” loop, a significant extent of which is attained by means of active pedagogy. The project incorporates curricular participation by students of graphic and multimedia design, wherein the participants get an opportunity to engage directly with the project’s objectives through impact-focused workshops and project-oriented curricular work. The main activities associated with such curricular integration are:
• Ethnographic studies with the specific communities of practice;
• Supporting multi-disciplinary actions related to the recovery and restoration of unique materials and testimonies;
• New product and packaging design
• Building and maintaining the research’s various online access points;
• Supporting the public dissemination of proceedings via community radio.

The project additionally recognises the need to reconsider the concept of “Wealth” as embedded in the material culture and human narratives surrounding the traditional industrial contexts. Much like in the case of the term “ageing”, above, it can be argued that the term “wealth” has undergone a reductive semantic process of signification, brought to tacitly invoke profit on a rather strict, if underwritten basis.

However, and as much as financial viability is likely the primary factor in the longevity of traditional industries and crafts, we argue for a polysemic re-inscription of the term, whereby “Wealth” is just as appropriate a term to invoke historical legacies, empirical wisdom, practical skills, interpersonal acknowledgment and existential resolution.

As researchers, we have witnessed these dimensions at work among the above case studies (and attempted to foster them according to the desirable inputs of design research); we are thus able to vouch for their equal decisiveness in said processes of reactivation. The expression “to be valued” may bring us back to the issue of etymology, as the term “value” may point to the term “profit” just as it may point to the term “acknowledgment”. As design researchers, we believe the key lies in the harmonisation of both.
References

