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“Folhas Velhas” from Vista Alegre Porcelain Factory: Experimenting with ‘chance’ in the manufacturing system

abstract

This reflection is based on a dialogue between industrial and handmade manufacturing systems with the goal of discussing the possible relationships between technique and the signifiers of chance. We seek to reveal how ‘chance’ may induce creativity through Design in the industrial process - in this specific case, in the Folhas Velhas¹ from the Vista Alegre Porcelain Factory - by optimizing material and immaterial resources and reusing materials considered as ‘refuse’ by the manufacturing system itself, giving them new meanings by integrating them into new artifacts.

keywords

palimpsest, chance, experience, crafts, technology

Introduction

“[...] the great intellectual challenge of this Age of Information is not coming up with a grand unified theory in physics, or discovering the origins of human life. The great challenge is how we can be better served by what we already know.” (Willinsky 1999: 4).

Developed within the scope of a Master's thesis project, this paper presents itself as an example of innovation based on the *poesis* of Design through a skillful, sustainable and ecological exploration of ‘what we already know’ and, simultaneously, with the aim of contributing to a smart, sustainable and inclusive growth in Europe – as defined by the European Commission Communication “Europe 2020” –, it may become a useful challenge for research through the lens of Design in the contemporary world. Analyzing the Portuguese territory it is possible to notice that the traditional manufacturing processes are still very present in its productive network². Most of the Portuguese industry consists of small manufacturing industries where a serial manufacturing system is often qualified by manual work. Therefore, it is pertinent to optimize the existing tacit knowledge, thus contributing to the differentiation and sustainability of the Portuguese productive network and territory.

¹ Folhas Velhas is a Portuguese expression that means “old sheets”.

² We feel it is appropriate to state that 95,5% of Portuguese industry is a small scale business with less than 10 workers, amounting to 43,3% of the total industry workforce. These industries are small manufactures where, as noted above, the work process is very similar to handcraft. Medium scale industry in Portugal amounts to 4,2% of the total and employs between 10 and 249 workers. Only 0,3% of Portuguese industry is large scale, and it operates mainly in the energy sector. (ROSA & CHITAS 2010 in ALBINO, C. and RODA, R. 2012)

Technique and “Folhas Velhas”

At the Vista Alegre Porcelain Factory - a large-scale company that represents one of the most traditional areas of the Portuguese manufacturing system and is internationally recognized for the quality of its ceramic products - it was possible to verify, during an in loco observation period, that its industrial processes, despite the company's size, continue to incorporate handcrafted methods. The integration of handcrafts into a serial manufacturing process presented itself, simultaneously, as an essential contribution and as an opportunity to generate more sustainable and ecological creation models, which are also very meaningful because they integrate stories that have these qualities.

Working with porcelain, faience, stoneware, glass and crystal productions (Vista Alegre 2013), the Vista Alegre Porcelain Factory is still building its history, which began 190 years ago. Its constant search for the improvement and technological development of its manufacturing processes through creative training, ever since the creation of the Drawing and Painting School in the mid-19th century, shows the factory's concern in the transmission of artistic knowledge.

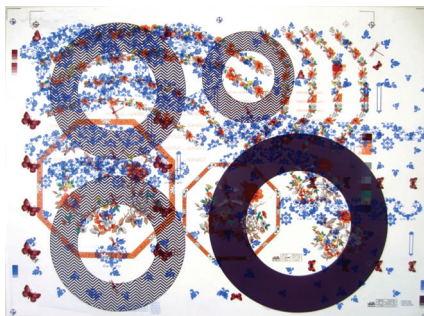
This research work is based on the manufacturing context of the *Folhas Velhas*, an expression coined by the workers who were responsible for the manufacturing process, specifically in the decal department. The *Folhas Velhas* result from the shape of the support papers that, due to some kind of flaw or imperfection in the decal printing process, are discarded by the printer who notices the error while printing or controlling the quality of the printed decals.

The *Folhas Velhas* emerge from imperfection and error and, through a selection aimed at controlling the quality of the industrial production, they are rejected and become surpluses of the very process that originated them: a linear, industrial process. These discarded sheets of paper are kept and used for cleaning the screen printing canvases.

“Folhas Velhas” and the manufacturing system

This project is aimed at turning the *Folhas Velhas* from a production tool into a creative raw material. We seek to reveal how the dialogue between technology, process and ‘chance’ can induce creativity in manufacturing processes that are already consolidated with the goal of adding value to mass-produced artifacts by optimizing – material and immaterial – resources, and by giving new meanings to ‘refuse’, i.e., to the *Folhas Velhas* of the manufacturing system.

Figure 1. . Folha Velha. Screen print on paper, 55 cm x 75 cm. Source: Eliézer Nascimento Junior



The procedural method associated with the *Folhas Velhas* is based on the principles of transformation, reuse and visual decomposition through an overlapping process in the absence of a pre-defined visual project. In an attempt to become a “new sheet”³, this material was sieved by the selectiveness of the excellence standards of the industrial process that, trying to limit the material damages of that loss, rescues it, repositions it and reuses it, giving it a different function: cleaning the printing screens and removing the impurities and traces that may compromise other prints⁴. In other words, its function as *Folhas Velhas* is to prevent the creation of more *Folhas Velhas*, caused by the fatality of error.

However, chance eventually gives a peculiar expression to this material. Through these continuous cleanings processed by new prints, it reveals a particular beauty - the beauty of chance -, which is based on an unusual and random mix of overlapping layers of ornaments and colours. Here we are able to see that chance may act as an agent that induces a visual composition based on the lack of planning and on informality – associated with the destruction of the shapes that had been previously planned for the decals -, two features that are inseparable from the manufacture of the *Folhas Velhas*.

Overlapping stories

That visual construction based on overlapping layers is what makes it appropriate to use of the concept of palimpsest in the production of contemporary images for a visual analysis of the artifacts produced in this project. The visual surface produced by the *Folhas Velhas* conveys an unlimited source of “ways of seeing”, which is similar to the potential of an “open work” (Eco 2005). The elements it presents - each layer, each gap, each colour, each drawing - are connected to other elements, either above, below or between the layers. They appear as “strata that relate themselves through interstrata, through specific rhythms and synchronicities with certain systems” (Deleuze 1997 apud Bicudo 2011, author’s translation), in this case, through chance.

In this way, we experiment a path that attempts to give shape to a process focused on the possible new meanings of this raw material – the *Folhas Velhas*, which are already the result of a resignification process – in order to discover the possibilities of a dialogue between technology and the signifiers of chance.

By introducing chance as a variable in the process - a stakeholder, according to Krippendorff’s idea (2006) – it opens new possibilities of thinking about ways to develop a project. This unpredictability brought in by chance helps to build a new aesthetic based on the extrapolation of the industrial manufacturing methods that are developed, pre-defined and followed by Vista Alegre.

Simultaneously, this experience takes advantage of the existing manufacturing system, as well as of the existing standard pieces, in order to experiment a dialogue of trial and error between techniques and chance, giving random responses to visual inputs. Manual work comes into play in the stamping strategies, from the selection of the sheets to the manual application of decals on porcelain.

³The expression “new sheet” refers to the decal sheets that were approved in the quality control process.

⁴The cleaning process is repeated, on average, eight times per sheet. Each repetition uses a different *Folha Velha* to receive a different set of drawings. After being used for cleaning the screens, the *Folhas Velhas* are put to “rest” so they can absorb the ink and be reused in future cleanings. And it is this continuous cleaning process that builds their visual compositions, layer after layer, colour after colour, drawing after drawing, cleaning after cleaning.

Figure 1.
Folhas Velhas
decal stamping.
Source: Eliézer
Nascimento
Junior



The raw material used in this project has an industrial nature. It was conceived by a serial manufacturing process and rejected by that same process due to an error that turns it into a cleaning tool and gives rise to differences caused by occasional combinations of printed layers. This coincidence produces unique artifacts, the *Folhas Velhas*, which, in this project, induce the creation of new and unique porcelain artifacts.

The tendency towards a preference for exclusive objects that are able convey different impressions through specific aesthetic experiences that move away from the context of mass production and are closer to handmade practices is currently a reality, as highlighted by Cardoso (2012).

In the 1960s, the paradigm of industrial manufacturing was still mass production: large quantities of similar items for everyone. Nowadays, the industry is visibly moving towards a flexible manufacturing system, with more and more sectors trying to segment and adapt their products to meet the demands for differentiation. (Cardoso 2012: 17, author's translation)

So, it is up to the designers to understand the issues that, visibly or invisibly, draw the attention of specific users within the Design context. It is in the field of language that artifacts make sense; it is here that this exchange takes place through a process of coordination of actions and perceptions that generate meaning.

Therefore, it is important to highlight the practice of experience in Design processes in order to allow the induction of a constant search for possible visions of a desirable future, thus inserting Design in the social logics of the search for understandings that produce future interventions within an expected context. De Sign is associated with the idea of segno *nobili*, which is implicit in recreation processes. In order to allow this future to actually happen, we need to develop structures that have the ability to format it through the creation of possible future spaces (Krippendorf 2006).

Design as a process aimed at realizing projects, taking responsibilities and choosing the discourse used in the narratives has the ability to make these narratives come true by being in line with the other players that are part of the Design context. These are the factors that guide the designer's actions (idem 2006).

In this process, innovation is present in the resignification of industrial artifacts that were conceived to be used as production tools, the *Folhas Velhas*, which emerge due to the need to fulfil one of the production stages: decal screen printing.

An error becomes a value! It is the starting point for the construction of the *Folhas Velhas* and, in this experiment, errors become catalysts for innovation within a dialogue between technology and the interpretation of chance, embodied in the appropriations

and resignifications that are made possible by the experiments we propose. And precisely because we are talking about innovation, experimentation and testing possible scenarios, errors are also invited to participate as agents in a process in which all the results are considered valid and become, together with chance and authorship, one of the main procedural agents.

So, error, combined with thoughts on the project's vision, stands out through a transgression of the sector's orthodox methodology, aspiring to the innovation applied in the creation of the experimental pieces that compose the "*Folhas Velhas, por Acaso*" porcelain collection.

It is the intersections, the interrelations, the mixes of prints produced by chance that fill these pieces with unpredictability and, once again, subvert the industrial logic based on controlled results.

The curiosity – and, often, the surprise – with which the craftsman opens his oven is no longer possible for the industrial ceramist, to whom the results should always show an absolute compliance with the established parameters, where the surprise of the unexpected cannot exist. (Frasco 2005: 19)

Project and process

Chance enters the project on two occasions: in the random construction of screen printing layers and during the kiln burning process. The two variables of the process are then perceived. Firstly, we have time, associated with the absence of a pre-defined interval between the cleaning prints that cause the randomness of the *Folhas Velhas'* composition. Secondly, we have temperature, which gives rise to the complex behaviours of the pigments, depending on their nature and on the different relationships between the overlapped printing layers.

In this project we sense a subversion of the industrial system considering that the visual output contained in the *Folhas Velhas* is not legitimized by that process, even though it was originated by it. The project establishes another point of contact with handcrafts because it gives exclusive features to its products, which are, therefore, artifacts with a handmade nature built within the industrial logic.

Our intention is not to go against the classical aesthetics proposed by the brand. On the contrary, our aim is to realize that a new decorative approach may emerge from the brand's aesthetics, from the control of its technical processes in a dialogue with the informality of chance, rescuing values through the apparent disharmony of the overlapping layers, which suggests a porcelain-engraved palimpsest. So, using the factory's manufacturing processes – which occasionally integrate handmade processes – as a starting point, this project subverts an industrial logic based on controlled results.



Figure 3. Tea service from the "*Folhas Velhas, por Acaso*" collection by Eliézer

The meaning of the experience in the contemporary world

These porcelain artifacts are exclusive products, obtained with residual manufacturing costs, whose engraved pictorial material comes from the extraction of drawings included in the *Folhas Velhas* as decals.

So, by transgressing the technical determinations of material handling, by capturing what was discarded from its primary function - a material created by mistake -, we present a new collection that resulted in experimental objects characterized by their uniqueness. It is a sort of material reproduction of chance.

The intention of inserting the *Folhas Velhas* as an example of the production of contemporary images may be defined as a territorial transfer of that material from the industrial logic to a creative practice through Design, enriching 'what we already know' about handicrafts and choosing chance as the creator of visual narratives that entice new publics.

As for the pieces that were created as a synthesis of experiences within a sort anarchic manufacturing process, they are not an end but a beginning that raises the issue of the limits of rigidity, austerity and fragility within a context of modernity versus a new moment. In turn, the *Folhas Velhas* may represent a sort of metaphor in the representation of post-modernity. They are sheets of paper where we may observe thousands of multi-coloured possibilities and different thoughts, all overlapped in disharmony and looking for their balance as a creative process focused on the 'praise of imperfection'.

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