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INDUSTRIAL CULTURAL
LANDSCAPES: AN APPROACH TO
INTEGRATED AND SUSTAINABLE
MANAGEMENT FOR INDUSTRIAL
HERITAGE

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ABSTRACT

The article focuses on the analysis of two concepts combined: industrial heritage and cultural landscape. Therefore, it proposes assessments of integrated and sustainable management in industrial heritage cases in order to merge public policies for the preservation of cultural heritage inherent to the process of industrialization with those of urban planning and sustainable and socioeconomic development, through the integration of disciplines and stakeholders and the community participation in decision making. In addition to a bibliographical review of the concepts in question, the article analyzes two plans for integrated and sustainable management of industrial heritage: The Sustainable Local Development Program of the village of Paranapiacaba in Brazil and the Internationale Bauausstellung Emscher Park program in the Ruhr valley, Germany.

KEYWORDS

Industrial heritage. Cultural landscape. Integrated management. Sustainability.



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PAISAGENS CULTURAIS INDUSTRIAIS:
UMA ABORDAGEM SOBRE GESTÃO
INTEGRADA E SUSTENTÁVEL DO
PATRIMÔNIO INDUSTRIAL

RESUMO

O artigo reflete sobre a combinação de dois conceitos: patrimônio industrial e paisagem cultural. Dessa maneira, propõe-se a análise de ações de gestão integrada e sustentável do patrimônio industrial, no sentido de unificar as políticas públicas de preservação do patrimônio cultural inerente ao processo de industrialização com as de planejamento urbano e de desenvolvimento sustentável e socioeconômico, por meio da integração das disciplinas e das partes interessadas e da participação da comunidade na tomada de decisão. Além de uma revisão bibliográfica dos conceitos em questão, o artigo analisa dois planos de gestão integrada e sustentável do patrimônio industrial: o Programa de Desenvolvimento Local Sustentável da vila de Paranapiacaba, no Brasil, e o programa do Internationale Bauausstellung Emscher Park, na região do Vale do Ruhr, na Alemanha.

PALAVRAS-CHAVE

Patrimônio industrial. Paisagem cultural. Gestão integrada. Sustentabilidade.

INTRODUCTION

The heritage theme is nuclear in the land-use planning programs in contemporary societies. This is due to the need to structure material reference elements that can function as markers of stability in a transformative process of reorganization of identities and boundaries, also marked by increasing migrations and increasing intercultural complexity.

After an early period until the 1980s, when the notion of markedly Eurocentric cultural heritage centered on the origin of civilizations and the Renaissance, the 1990s saw an accelerated broadening of the concept and the affirmation of specific heritage segments, in particular industrial heritage, which accompanied the progressive collapse of traditional industries (OOSTERBEEK, 2017, 2019).

Relevant identity marker for communities descended from professionals in industrial activities, the desire to preserve industrial heritage has accelerated the awareness of the need to rethink models of refunctionalization of old collections that occupy large areas of urban and peri-urban spaces. This reflection, very expressive in port centers (such as Sydney) or miners (such as Mons), was accompanied by a transition from the site preservation paradigm to a cultural landscape valorization paradigm (at the turn of the millennium) and then to a global logic of integrated territorial management (from 2007-2008, but especially from 2010, when this logic progressively intersects with the concerns of sustainable development), which is evident in the Rio+20 summit and, since 2011, in the revaluation of the Humanities within the United Nations Educational, Scientific and Cultural Organization (UNESCO).

These are all processes that have emerged autonomously: reflection on industrial heritage, the evolution of the concepts of heritage and cultural landscape, and the evolution of sustainability and territorial management paradigms. But they are convergent processes that need integration. Understanding the process and contributing to this convergence is the scope of this article, resulting from the master's dissertation guided by Professor Luiz Oosterbeek, from the Polytechnic Institute of Tomar, Portugal.

The notion of *cultural landscape* has been explored in academic studies in the most diverse disciplinary fields, such as the arts, architecture, urbanism, ecology and archeology. However, it is in the field of geography that the theme was initially designed and mostly from the American Carl Sauer (1925, p. 46) definition that "*the cultural landscape is modeled from the natural landscape by a cultural group. Culture is the agent, nature is the environment and the cultural landscape is the result*". From then on, the study of landscape becomes a structuring part of the discipline itself, along with the notions of space, territory,

region and place. But it is the landscape that incorporates the cultural dimension into the work of geographers (BERQUE, 1984; CLAVAL, 2007; MEINING, 1979).

Cauquelin (1990) considers the formation of the Western notion of pictorial landscape from the art of painting and the Renaissance perspective, as transforming the view of nature as a sensitive perception or as a selective process of apprehending reality. Therefore, the importance of perspective in the invention and consolidation of the symbolic form of the landscape, which persists to this day and follows its own building rules, such as distance, vanishing point and horizon, was emphasized. The organized construction of an artificial image through pictorial laws of perspective is what Cauquelin calls the implicit and unconscious rules of landscape in the West.

Moreover, at the international level, the notion of cultural landscape, arising from the experiences of the UNESCO World Heritage Centre since 1992 and the propositions set out by Recommendation R (95) 9 and the European Landscape Convention (CONSELHO DA EUROPA, 1995, 2000), has been applied as an instrument of protection and management of cultural and natural heritage to overcome this dichotomy¹. Thus, the development of the concept of cultural landscape focuses on interdisciplinary discourse and community participation in decision-making to allow conscious and sustainable preservation of contemporary complex heritage, bringing together natural and cultural as well as material and immaterial aspects (MITCHELL et al., 2011).

However, according to Ribeiro (2007), the evolution and appropriation of the term cultural landscape within each discipline made it possible to consider it as polysemic and subjective, both theoretically and methodologically. In practice, the application of the concept of cultural landscape is vast and paradoxical, since everything can in principle be considered a cultural landscape. All landscapes are subjected to human interpretation and the attribution of objective and subjective values that culminate in common places, superficial applications and subjective evaluations.

The same author, then, states that the term and its application to heritage must be dynamic, constantly revised, to cross surface definitions and adapt to the evolution of landscape and human activities. Exploration and theoretical reflection are essential for the study of landscape, because the choice of a landscape conception and a determined methodology guides the results of the process of identification, attribution of value and preservation of cultural heritage.

Already the concept of *industrial heritage* will initially be approached in a broader sense of the term, on the impact of industrialization on humanity. At that moment, the computer, or the sheet, from which you see this work, the clothes you wear, the building you are in, the food you eat, everything that concerns the current way of life is directly or indirectly linked to the early nineteenth-century Industrial Revolution, which originated in Western Europe, especially Great Britain, France, Germany, and Belgium.

¹ For a deeper discussion on the application of the concept of cultural landscape in Brazil, see NASCIMENTO and SCIFONI (2010) and WEISSEHEIMER (2012) and for the discussion of the industrial cultural landscape theme of the Ruhr Valley area in Germany, see BLOTEVOGEL (2001) and RÜSEN (1998).

Rahóla (2007) notes that industrialization produced innovations, materials and methods that caused a deep break in constructions, machinery and utensils. At the same time, the mentality and habits of society have changed profoundly, favoring an important social and urban transformation, stemming from the living and working environment of a highly proletarianized population, independent of the countryside. The society that had agriculture as its economic base since the Neolithic period came to an end; a complete new society has developed. Moreover, the evolution of the means of communication and transportation has triggered the movement of globalization and the exponential acceleration of change in society that has led to the process of deindustrialization and the development of the information society. The impact of the industrial crisis was significant, factories were closed and abandoned, which deteriorated the environment and urban space and led thousands of workers to unemployment. Evidently, old lands and abandoned plants were a factor that devalued the image and, consequently, the attractiveness of the affected areas.

² For further discussion on interventions in industrial historical sites in Brazil, see RUFINONI (2013).

However, it is important to note that despite the actions, especially in the 1990s, of intervention and planning in abandoned industrial buildings and land, awareness of the value and heritage interest of the traces of industrialization began well before, in the 1960s, by English historians and scientists². The destruction of significant buildings, testimonies of the industrialization process, such as the London Coal Exchange and Euston Station, and the Paris Central Market, encouraged discussions and preservation initiatives in the 1960s and 1970s (KUHLE, 2009). Then there is the creation and intensification of studies on the subject of industrial archeology through the constant and growing threat to which industrial goods were subjected.

Buchanan (1972) defined industrial archeology as “*a field of study related to research, survey, registration and, in some cases, the preservation of industrial monuments. It also aims to achieve the significance of these monuments in the context of social and technical history*” (BUCHANAN, 1972, p. 20). In 2003, the International Committee for the Conservation of Industrial Heritage drafted the Nizhny Tagil Charter, which serves as a synthesis of definitions developed over the decades and addresses the problem comprehensively (TICCIH, 2003). In addition, in 2011, a joint letter between the International Council of Monuments and Sites (Icomos) and the International Committee for the Conservation of the Industrial Heritage (TICCIH) updates and expands the Nizhny Tagil Charter, and is identified as the Dublin Principles (ICOMOS, 2011).

Despite the importance of industrialization in the history of humanity, there is still resistance to assimilation and recognition of the cultural values of this fact for society, especially the immaterial ones. Looking at the evolution of the concept of cultural heritage, it is noteworthy the attribution of heritage value to temples, palaces, castles, churches, monuments linked to architecture and classical art, which were built and produced with the clear intention of representing a cultural or political power.

For Casanelles (2006), the traces of industry and work do not constitute a heritage ready for contemplation, as a work of art, and are devoid of value linked to their antiquity in the traditional sense of the term. In this sense, it was observed that one of the challenges of the preservation and conservation of

industrial heritage is the persistence of actions and interventions that are unrelated to culture and the historical, memorial and symbolic values of industrial goods, but mostly linked to immediate economic and land use interests, as found by Kühl (2010) and Del Pozo (2002).

From the combination of the terms cultural landscape and industrial heritage and their respective problems, we can outline the construction of the discussion about industrial cultural landscape, since integrated and sustainable management actions that seek the balance between environment, economy and society can contribute to the challenges and paradigms of preserving cultural heritage, including industrial heritage, supported by this article. In this sense, Kühl (2010) notes that, despite the increase in the number of studies, publications and scientific meetings on the theme of industrial heritage in the 1990s and 2000s, as well as analyses of specific industries and intervention experiences, an in-depth reflection on the concepts, methodologies and interdisciplinary principles of preservation of the vestiges of the industrialization process was not equivalently produced.

³The Zollverein Coal Mine Industrial Complex, located in the city of Essen, Germany, was inscribed on the UNESCO World Heritage List in 2001. For more information, see UNESCO World Heritage Convention (2001a, 2001b).

⁴In 2014, the dossier for the registration of the cultural landscape of the village of Paranapiacaba was submitted on the UNESCO World Heritage List. Available from: <http://bit.ly/2RDFS9l>. Accessed in: Dec 20, 2016.

MATERIALS AND METHODS

The methodology of the master's dissertation, on which this article is based, was divided into two parts, one theoretical and one practical. Firstly, a bibliographical review of the concepts in question was carried out: landscape, cultural landscape, cultural and industrial heritage, industrial landscape and industrial archeology, to evaluate the challenges and potentials of the association of these concepts and the approach of industrial cultural landscapes. Subsequently, from the finding that one of the problems of the concept of cultural landscape is its implementation, due to the commitment of several disciplines, two case studies of two integrated industrial heritage management plans already implemented were analyzed: The Sustainable Local Development Program of the village of Paranapiacaba, in Brazil, and the International Bauausstellung Emscher Park (IBA Emscher Park) Program in the Ruhr Valley region of German.

These case studies were chosen in view of their importance within the regional and international scenario, appearing on the UNESCO World Heritage list in the case of Germany³, or on the indicative list, in the Brazilian case⁴. In addition, the two management programs were responsible for a remarkable impact on the appreciation of culture and industrial heritage integrated with the sustainable and socioeconomic development initiatives of the territory. Thus, the analytical variables focused on the themes inherent in the management of cultural landscapes, that is, integrated territorial management, interdisciplinarity, population participation in decision making and sustainable development.

The village of Paranapiacaba is a district of the city of Santo André, state of Sao Paulo, surrounded by the Atlantic forest and Serra do Mar. It is an urban and railway complex built by the English company São Paulo Railway Company, built by the English company São Paulo Railway Company in the late nineteenth century to house workers on the railroad itself. In short, with incitement policies of the road transport to the detriment of rail transport in

Brazil in the 1950s, railways and railway stations were phased out and abandoned, causing the village to degrade in the 1980s.

On the other hand, the Ruhr river valley is located in the German state North Rhine-Westphalia and has been heavily marked by coal and steel production since the mid-19th century, which developed cities, exponentially increased population and profoundly transformed the European cultural landscape. The region was bombed during World War II for being an important German military and industrial strategic complex. The region's degradation began with the replacement of coal by other fuels, such as oil, natural gas or even imported coal, mined in other less costly areas. In addition to environmental pollution, the consequences of the decay of this massive industrial exploitation, economically dependent on single-sector, were the rise in the unemployment rate and the abandonment and degradation of urban and industrial areas.

It is important to note that the industrial cultural landscapes analyzed in this study in Brazil and Germany are antagonistic in the natural, historical, socioeconomic and political context. However, their problems can be considered similar and produce a discussion about integrated and sustainable management of industrial heritage and its implementation in adverse contexts.

⁵ Surface and population data were roughly estimated from a survey of general information sites in September 2016.

CASE STUDIES

First of all, it is important to present some considerations between the two case studies. First, we point out notions about the territory scale of each of the management plans. Regarding the intervention area, it is 90km² in Paranapiacaba and 4.000km² in the Ruhr region; As for the number of inhabitants, there are approximately 1,000 in the Brazilian case, to 5 million⁵ in the German case; and with regard to the number of companies installed in the territory, there is one in the village of Paranapiacaba, the São Paulo Railway Company, and one hundred in the Ruhr river valley region. This remarkable difference in scale explains the great recognition of the Ruhr region within the international landscape, and the case of Paranapiacaba is poorly recognized.

Next, it was also considered appropriate to emphasize the distinctions between the historical realities of Brazil and Germany. As much as industrial development in both cases is chronologically compatible, from the mid-nineteenth to the mid-twentieth centuries, the historical, political, geographical, and socioeconomic situation and context are categorically adverse. In this sense, the appropriation of the territory by the industry occurred in different ways in each case; in Brazil, the industry emerged as an external factor, imported, of English reference and implanted in an unprecedented territory. Already in Germany, the industry is born of a strong connotation of imposition, resulting essentially from the human genius and the rational and functional search.

Moreover, despite the typological distinction of industrial heritage – in Brazil linked to rail transport and in the Ruhr region, linked to coal mining and steel – intense human and urban relations are present in both cases. That is, regardless of the industrial activity carried out and its scale, industrialization intervened in

⁶ For more details on themes related to architecture, urbanism and restoration interventions in Paranapiacaba, see Cross (2007, 2013).

the way of life and, consequently, in the individual and collective memory of societies around the world.

Following this brief comparative introduction of the two case studies, some points will be presented from both programs, those considered most pertinent to the discussion of the assimilation of cultural landscape and industrial heritage. In 2001, the Municipality of Santo André created the Paranapiacaba Subprefecture to address the specificities of the village and its surroundings, with the intention of intensifying the process of village requalification through the implementation of a decentralized municipal management that seeks to articulate policies of urban and socioeconomic development with policies of preservation of cultural heritage, environmental conservation, tourism and community participation⁶. With the acquisition of the patrimonial set of Vila de Paranapiacaba by the City Hall in 2002, it was possible to elaborate and implement the Sustainable Local Development Program (FIGUEIREDO, 2014b).

This program was a pioneer in Brazil because it established a new policy for the preservation of cultural heritage based on the concepts of the cultural landscape, although this notion was only added to the program in 2005, since the preservation listing was no longer pronounced sustainable for the needs of the preservation of the cultural heritage. The Program has integrated seven public policies: tourism, cultural heritage preservation, urban planning, environmental conservation, social development, community participation, and administered and financial management of public buildings (FIGUEIREDO, 2014a).

Created under the Program in question, the Special Interest Zone of the Heritage of Paranapiacaba (Portuguese acronym: Zeipp) Municipal Law (PMSA, 2007) was considered innovative for the Ministry of Cities and for the Institute of National Historic and Artistic Heritage (IPHAN), as it worked with the symbiosis between a local master plan and rules of use and occupation of the territory. Moreover, for Figueiredo (2014a, 2014b), Zeipp is characterized as the main instrument of political orientation of Paranapiacaba.



Figure 1 – Village of Paranapiacaba, Brazil, 2017
Source: Photo by Luisa Gonçalves.

On the other hand, from a pre-established ten-year duration from 1989 to 1999, IBA Emscher Park – although the abbreviation IBA literally means “International Architecture Exhibition” – was not an exhibition but a program of activities that brought together various parts, such as local administrations, industries and companies, non-governmental organizations and the population. The main objective was to stimulate and incite new ideas and projects based on urban, social, cultural and ecological development. Thus, the exhibition was a practical instrument of moderation and motivation for the production of political and professional discussions related to the development of the region. However, the projects were executed through autonomous contracts from local administrations, companies and organizations promoting development initiatives (CASTELLO, 2011).

The study considered both the Sustainable Local Development Program of Paranapiacaba and the IBA Emscher Park project as integrated and sustainable management plans of the industrial heritage, but a primary difference is noteworthy with respect to the method. In Paranapiacaba, the plan consisted essentially of the organization of traditional means of land-use planning and cultural heritage management based on projects, initiatives and laws (FIGUEIREDO, 2014b). In the Ruhr region, it was not a management plan, but an innovative space for discussion and encouragement from the exhibition format, which went beyond architectural and urbanistic issues and also addressed issues related to sustainable and socioeconomic development (CASTELLO, 2011).

Entering the analysis of the two experiences, it can initially be considered that the elaboration and implementation of both were intuitive, early and politically leftist. Intuitive because the plans were not driven or influenced by other experiences or management models. Thus, due to the problems of the deindustrialization process and the identity of the population in relation to their industrial historical heritage, initiatives were born intuitively from local communities and administrations seeking to reverse the landscape of decay and abandonment. Then the concepts related to the management of cultural landscapes, even unknown to the actors, emerged as a way of access to regional development.

The IBA Emscher Park project was remarkably early, dating from 1989, even before the approval of the cultural landscape category created by UNESCO in 1992. The Brazilian case can also be considered premature, since the concept of cultural landscape is added to the plan only in 2005, four years after its implementation began in 2001. In addition, there is a left-wing political engagement in both planes, both seeking recognition of heritage and identity of the working classes and overcoming the problematic socioeconomic scenario of the deindustrialization process (BERGER; WICKE, 2014; FIGUEIREDO, 2014a).

In addition, it was observed that the presence of the tourism sector is greater in the Paranapiacaba Program, with three stages for the sector (implementation, qualification and formalization and regularization) (FIGUEIREDO, 2014a). Already in the case of IBA Emscher Park, this sector is not mentioned within the objectives and discussions expressively. However, it is evident that the project affected and increased the sector in the region.

Figure 2 – Zollverein Coal Mine Industrial Complex, Essen, Germany, 2016
Source: Author's photo.



Another point not to be overlooked is the fact that both programs have been discontinued. IBA Emscher Park, as an exhibition, had a predefined ten-year duration from 1989 to 1999. And the Paranapiacaba village program was canceled in 2009 with the change of local administration, although some projects and initiatives persist to this day. Moreover, adaptive management or monitoring and evaluation initiatives were not identified in both plans, despite the constant discussion and creation of solutions during the period of the projects in question. Thus, it is emphasized that monitoring, evaluation and adaptation concepts are essential in view of the dynamic and multipurpose aspects of cultural landscape management.

DISCUSSION

From the contributions coming from the bibliographic review combined between cultural landscape and industrial heritage and the analysis of integrated management plans in industrial contexts, six brands were considered pertinent to the discussion of the management of industrial landscapes.

1. The marginalization of industrial heritage

There has been considerable recent interest in industrial heritage on the part of the UNESCO World Heritage Center and the institutions responsible for the protection and preservation of cultural heritage. Although this finding is already recognized and widespread in academic heritage studies, it should be noted that industrial heritage is still marginalized compared to other heritage typologies. A limited number of publications, conferences and expert meetings

have been conducted so far in the international sphere on the management of industrial cultural landscapes. This points out that the recognition of industrial heritage is a process still under development.

2. he idea of panorama and perspective of cultural landscapes

The western notion of perspective pictorial landscape and its strong relationship with nature, as signaled by Cauquelin (1990), is present in all cultural landscapes inscribed on the UNESCO World Heritage List. This fact shows that the construction of the concept of cultural landscape is not yet totally opposed to the traditional landscape conception, intensely related to the ideals of panorama, scenery and static contemplation. This hinders and distorts the proper diffusion of integrated and sustainable management of cultural landscapes.

3. The untouchability of cultural heritage

This mark can also be considered common and recurrent within academic discussions on the conservation and preservation of cultural heritage in general. However, it is pertinent to highlight the questioning of the usual actions of the UNESCO World Heritage Center and the institutions responsible for the protection and preservation of cultural heritage regarding the untouchability of assets and stagnation of management plans. The difficulty in adapting management plans to the complex and dynamic changes in societies and economies of contemporary postindustrial landscapes was seen from the interruption of both the Sustainable Local Development Program of the village of Paranapiacaba and the IBA Emscher Park project, in Germany.

In addition, with regard to the predisposition to untouchability of heritage assets, one can point out, for example, the removal of the city of Dresden, Germany, from the World Heritage list in 2009, due to the controversial construction of a bridge to reduce traffic within the historic and central part of the city.

Today, communities change, generations change, economic activities develop, governments and policies change, lifestyles and habits change constantly and faster and faster. For these reasons, the management of cultural heritage needs to be continually evaluated and reworked, as stated by Ribeiro (2007). Thus, the functionality of the industrial heritage must always reinvent itself and innovatively articulate past and future. In other words, authentic interventions need to be sought and new economies and interesting solutions implemented for both private investors and local communities, as the needs and aspirations of the ever-changing contemporary society emerge.

4. Context outside Europe and North America

Despite the fact that Europe was the geographical and political space of the genesis of the industrialization process, with Great Britain as its epicenter, the Industrial Revolution also reverberated in economic, social and cultural

⁷ It should be noted that, in other contexts, in Africa and Asia, the issue of cultural and industrial heritage may differ from that presented in this analysis, having another relationship on the part of public administration and local communities.

relations worldwide, evidently with intensities and at different times. In the context of Brazil and Latin America⁷, the issue of cultural heritage, especially industrial heritage, is not a priority in the actions of governments in the face of latent social and economic problems, in most cases.

Thus, the preservation of industrial cultural heritage is not evident, especially today, when aspirations and right-wing political movements are accentuated. Although this is not necessarily always the case, this study found that the origin of the plans analyzed was linked to initiatives of the left-wing political movement, with a view to valuing the working class and industrial culture.

However, the case of Paranapiacaba demonstrated that the combination of cultural heritage preservation policies with those of sustainable and socioeconomic development is possible in the context outside Europe and North America. It was evident that the success of this integration was governed by the concept of cultural landscape and proved to be a relevant instrument in unfavorable socioeconomic contexts.

5. The approach between cultural landscape and resilience

Although the approach between cultural landscape and resilience is not mentioned in the analysis of the management programs of the village of Paranapiacaba and the Ruhr region, this approach was also considered pertinent and current, to promote a broader and more solid view of cultural landscapes management. The notion of resilience favors coordination and offers possibilities for leveling out difficulties or changes without altering the essential characteristics of a given territory, as this notion focuses on the dynamics of change and the ways in which it can be adapted and modeled (PLIENINGER; BIELING, 2012). In addition, simplistic approaches transcend, approaches already indicated in the discussion of this article, and linked to the ideas of untouchable and static panorama.

6. The inclusion of the notion of dilemma in the community debate

Given the importance of population participation in decision-making and the discontinuity of cultural landscape management programs, the Portuguese Integrated Territorial Management program was appropriate. Besides the perceptions of communities' identity and representativeness with their industrial cultural heritage, the Portuguese approach also aims at the importance of including in the consciousness of communities the notions of contradictions and dilemma. That is, recognizing the contradiction positively, not something to overcome, because it generates dynamics and dilemmas, not problems.

Thus, it was considered appropriate that cultural landscape management programs and their respective popular discussions take this approach and seek the dynamic balance of the dilemmas that arise from contradictions. Moreover, it is also appropriate to integrate the understanding that the present action does not start from scratch, but is a mere moment in the trajectory that we can influence in a limited way.

RESEARCH CONCLUSION AND PROSPECTS

The research perspective, focused on local, regional and national actions, considers the six marks presented in the discussion and concerns all the interested public: communities, specialists, researchers from various areas, administrators, companies and private institutions, non-governmental organizations and bodies responsible for the preservation of cultural heritage. Based on the fact that the appropriate dissemination of the cultural landscape management mechanism to industrial contexts is a pertinent option, it is proposed to prepare publications, hold conferences, workshops, discussion forums on the theme of industrial heritage linked to the integrated and sustainable management of the territory, given that this specific approach remains unexplored to this day.

The experiences analyzed in Brazil and Germany have identified that actions converging to integrated and sustainable management of industrial cultural heritage should not only depend on cultural heritage preservation bodies or local administration, but also on the engagement of stakeholders and the community, especially. Thus, this article aims to disseminate the integrated and sustainable management mechanism within communities and local administrations, and facilitate its insertion and application within post-industrial realities.

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