

“12 FOR A WAR – A PEACE MISSION” - OUTCOMES OF A VOLUNTARY ACTION AIMED AT THE CONSERVATION OF CULTURAL HERITAGE

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Abstract: *The paper is referring to the recovery, preservation, restoration and reconstruction of an old wooden loom from Veneția de Sus, Părău village, during a voluntary action for cultural heritage conservation. The volunteer restorers were 12 students of the Faculty of Wood Engineering of the Transilvania University Brasov, who started this action as a “war” against time and degradation, indifference and oblivion, factors causing too often irremediable losses of a significant part of our cultural heritage. “Let us weave our future with respect to the past” was the action logo, which was finalised by a “peace treaty” when the mission was successfully accomplished. The paper presents the phases of this action including documentation on this type of traditional artefacts, identification of the recovered elements of the old wooden loom, analysis of their initial conservation state and preservation – restoration operations, up to valorisation of this action by exhibitions and events meant to raise public awareness on the importance of conserving tradition and cultural heritage.*

Key words: *cultural heritage, conservation-restoration, wooden loom.*

1. Introduction

Conservation of material and immaterial cultural heritage should be a continuous and assumed action of any community with the view of preserving its cultural identity [6], [7]. It is also of extreme importance to realise that cultural heritage refers not only to the objects with high artistic and historic value collected by museums, but also to the old objects from traditional households, which reflect the every-day life and special events, the ancient crafts, techniques and traditions.

Unfortunately, this part of cultural heritage is usually neglected or totally ignored, leading to irremediable losses by abandonment and degradation if no actions are taken. Education, professional training, awareness, implication and volunteering are important ingredients for successful actions [8], [10].

The team of the Laboratory of Furniture restoration at the Faculty of Wood Engineering of *Transilvania* University Braşov, has been, for the past ten years, continuously involved in the active conservation of wooden cultural heritage

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artefacts and formation of educated specialists, while also highlighting the beauty and value of old wooden artefacts and raising public awareness on of the importance of wood conservation through dedicated exhibitions and public events. Voluntary actions, involving both professionals and students, for recovering, identifying and conservation of various wooden artefacts, especially from the neglected /ignored part of cultural heritage, are becoming a tradition [8-10].

The present paper refers to such a voluntary action named “*12 for a war – a peace mission*”, carried out under the motto “*Let us weave our future with respect to the past*”. The principal actors were 12 voluntary students who started a “war” against degradation, oblivion and abandonment, fighting with the “weapons” of enthusiasm and knowledge, passion and patience to save from irremediable loss a horizontal wooden loom. This was brought to our laboratory as a pile of dismantled and very degraded wooden elements to become a restored, reconstituted traditional object with both technical and historical value.

A loom is a hand working machine used for textile processing, more precisely, a device used to weave cloth by interlacing warp and weft threads (<http://en.wikipedia.org/wiki/Loom>). There are different types of looms as to construction (e.g. vertical, horizontal) and complexity, but they all serve the same purpose of weaving, a very old traditional technique.

It seems that horizontal looms were invented in China around 2nd Century BC, where from the knowledge of its use spread over time towards the west and during the Early Middle Ages Europe became acquainted with this new type of weaving device, as suggested by the oldest known depiction of a horizontal loom in an English manuscript, mid 13th century [1].

Natural fibres processing and cloth weaving represent important traditional Romanian crafts, so that wooden looms were present in traditional households [2], [3], [11], “*the evidence of the origin and early stages in our country are lost in the mists of time and evidenced by ancient writings and excavations*”(quotation from Cioară [2]).

The restored wooden loom originates in Veneția de Sus, Părău village, being dated probably around the 1940’s, based on a handwriting inscription “*made by Atanase Voiteşenco for Margalina Popa in 1964*”, readable on an obviously newer wooden element (swinger beater-in – similar to element 8 in Fig.2), belonging to another loom found in the same household.

Worldwide spread projects of restoring, reconstruction or documenting old wooden looms [1], [4], [5] highlight their technical, historical and documentary value justifying scientific conservation.

2. Objectives and phases of the action “*12 for a war – a peace mission*”

The action aimed at conserving the wooden elements and reconstruction of an old loom by the common effort and implication of a team of 12 volunteer students, as well as the valorisation of both the restored object and the meaningfulness and importance of the action through exhibitions and public events with social impact. This was achieved by specific objectives and phases.

The actual objectives were: documentation on the wooden looms, identification of the recovered elements from the old loom, preservation and restoration of the recovered elements, reconstitution of the old horizontal wooden loom by assembling the restored components.

A first phase of the action included the organisation of the volunteer restorers

group, assignment of the recovered wooden elements to the volunteers and documentation on the wooden looms.

In the next phase of the action, the recovered elements "adopted" by the volunteer restorers were identified as parts of a loom, an inventory was completed and it was further proceeded to their actual preservation and restoration, including investigations and documentation of interventions.

The final phase included reconstitution of the wooden loom from its restored elements and its expositional valorisation alongside promotion to raise public awareness.

3. Documentation phase

pre-condition documentation covering both historical and technical aspects [7]. A conservation specialist should understand the object as construction and functionality and place it in relation to similar objects to highlight common and differentiating features. Moreover, a functional object should be understood in correlation to its function, respectively the wooden looms in relation to the traditional weaving technique. Within the present project this phase included both literature search [2], [3], [11] and documentary visits to the Ethnographic Museums of Braşov and Săcele, facilitating discussions with museum specialists and access to recorded videos from their *in situ* documentation on traditional fibres processing (Figure 1).

Conservation of any artefact implies as a



a



b



c

Fig. 1. Documentation on the different types of horizontal looms: a) loom from the collection of the Ethnographic Museum of Braşov; b) loom from the collection of the Ethnographic Museum of Sighetul Marmatiei; c) structural details of the loom "a"

The base structure of a horizontal loom (Fig.2) is a dismantling wooden frame consisting of two side boards (left and right) (1) and two or three crosssties connecting the frame across its width, supported on four posts (legs) (2), which also support two smooth rollers: a breast or cloth beam (4) at the front and a warp beam (3) at the rear. The warp threads (5) are fixed to the breast beam and lead horizontally to the warp beam where they are fixed and wound as storage. The finished cloth will be gradually rolled up on the breast beam. The two beams are often provided with ratchet wheels (tooth wheels) and with ratchet pawls or simple

break sticks. An essential part of the loom is the spacing mechanism consisting of one or more frame heddles (not figured) and two or more treadles (6). Each heddle is connected on its bottom side with a string to a treadle which the weaver controls with his feet. The pressing in of the passed weft to the ready cloth is done with a swinging beater-in (8) including at the bottom part the reed (7) created by a rectangular frame filled with a dense row of thin smooth teeth from reed splits. One or two warp threads pass through each gap depending on the width and density of the cloth [1], [11].

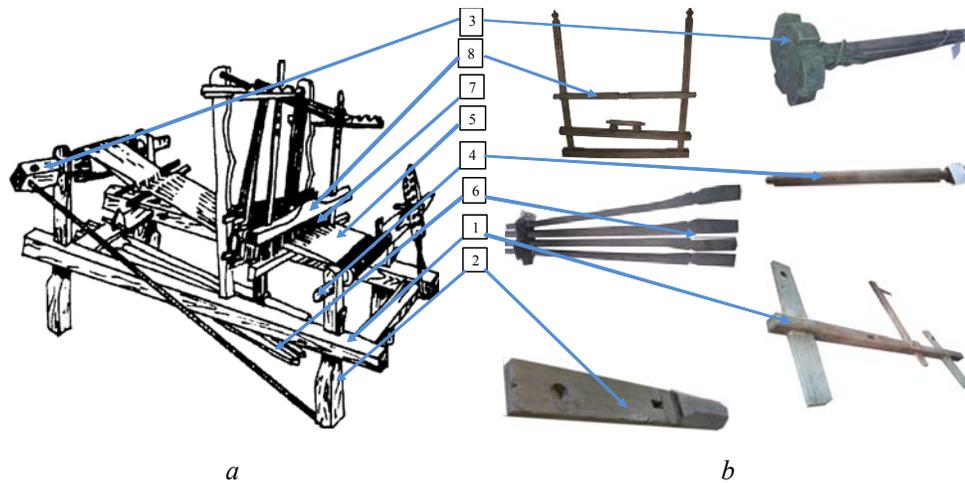


Fig. 2. a) Schematic structure and main elements of an horizontal wooden loom;
 b) Identification of corresponding elements of the restored loom: 1-side board of the base wooden frame; 2 – leg (post); 3 - warp beam; 4 - cloth beam; 5 - warp; 6 - treadles ; 7- reed; 8 – swinger beater-in.

4. Aspects of preservation - restoration

A total number of 20 original elements were recovered and identified as corresponding loom parts (see Figure 2 as exemplification), based on the information from the documentation phase. All the elements were coded in a rational way, investigated to establish the type of

material and the initial conservation state and further preserved and restored by the group of 12 enthusiastic 1st and 2nd year BSc students of Wood Engineering acting as volunteer restorers under professional supervision.

The recovered elements, made of beech wood (*Fagus sylvatica*), presented various defects (Figure 3) as result of use and wear

during their service life and of specific degradation and deterioration phenomena, mostly due, or accelerated by their abandonment in inappropriate conditions of humidity and temperature, the loom components being totally neglected and covered by a thick layer of dust and spider webs.

All wooden components presented evidence of advanced biodegradation and

bio-deterioration as a result of insects (Figure 3a-d) and/or fungal attack, leading to areas of frail wood (Figure 3b), fissures, cracks and broken parts. The surfaces were extremely dusty (Figure 3a-e) and dirty, presenting depots and different types of spots, including rust stains caused by the corroded metallic elements used in previous attempts of consolidating the structure (Figure 3e).

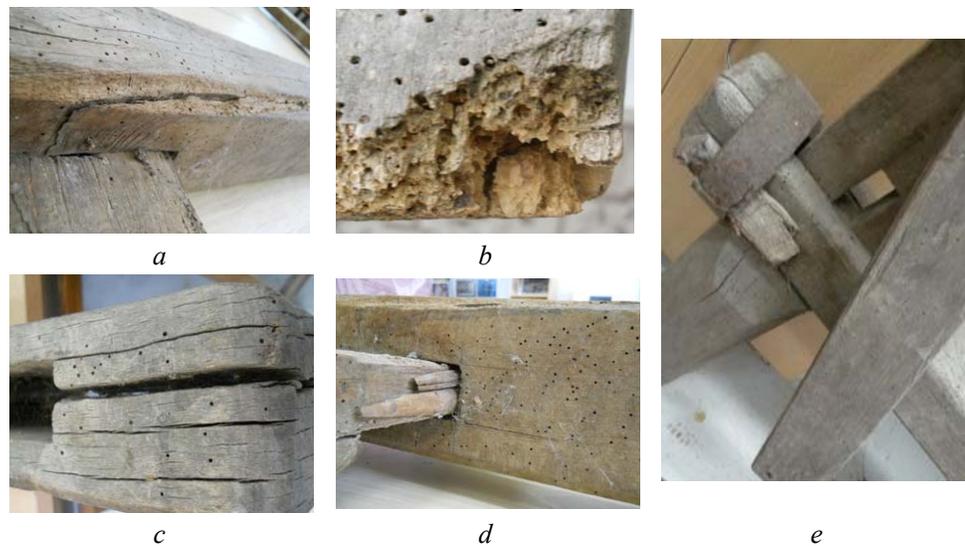


Fig. 3. *Aspects of the conservation state before restoration: dusty and dirty surfaces (a, c, e); evidence of biological attack by insects (a-d); degraded, frail wood leading to ruptures (b); cracks and fissures in wood (a, c, d, e); attempts of consolidating broken parts by metallic elements and wooden pegs (e)*

The preservation – restoration schedule, though specific to each element, generally included some common operations, such as: thorough stepwise cleaning, curative preservation, consolidation of frail wood, gluing of cracks and broken parts and structural consolidation of some elements. Some aspects of these operations are illustrated in Figure 4. Cleaning started with dust removing by brushing and aspiration with a vacuum cleaner and continued with wet cleaning employing a

water solution of neutral soap and ethyl alcohol. After drying, the surfaces were gently sanded and wiped out with a cotton cloth dipped in a water-ethyl alcohol mixture. Curative preservation against insects attack was the next very important step. A solution containing 0.2g/l deltamethrine in ethyl alcohol was employed; this was repeatedly injected into the galleries (fig. 4b) between successive applications the degraded wooden elements being wrapped in PVC foils to

increase treatment efficiency. The areas presenting evidence of fungal decay (bottom parts of the legs) were treated with a cooper-chromium based fungicide (Romalit N 10%). Following a conditioning phase, the areas of frail wood were consolidated with a Paraloid B72 (solutions 5-10% in acetone- ethyl alcohol), applied by injecting or partial immersion of elements (bottom part of the legs). Remediation of fissures, cracks and broken parts was performed by gluing with Scotch glue; strips of beech veneer or solid wood were used when necessary to fill the large cracks (Figure 4c), while clamps were used to ensure a correct positioning and pressing (Figure 4c,e). Structural repairs included remediation of broken

joining elements and gluing of ruptures (Figure 4d, e, g). Completion of missing parts was made with beech wood and the restored areas were slightly coloured to be integrated harmoniously in the context of the old object. Preventive conservation and chromatic integration of all elements was made by successive brushing with solutions of tannin (10 g/l) and Romalit N (10%) (Figure 4f). Furthermore, a basecoat with insecticide and fungal protection properties (containing also approximately 7% alkyd resin), namely Proxilim made by Policolor Bucharest, was applied and allowed to dry for minimum 24h. Finally, a layer of beeswax was applied for extra waterproofing and a nice aspect.

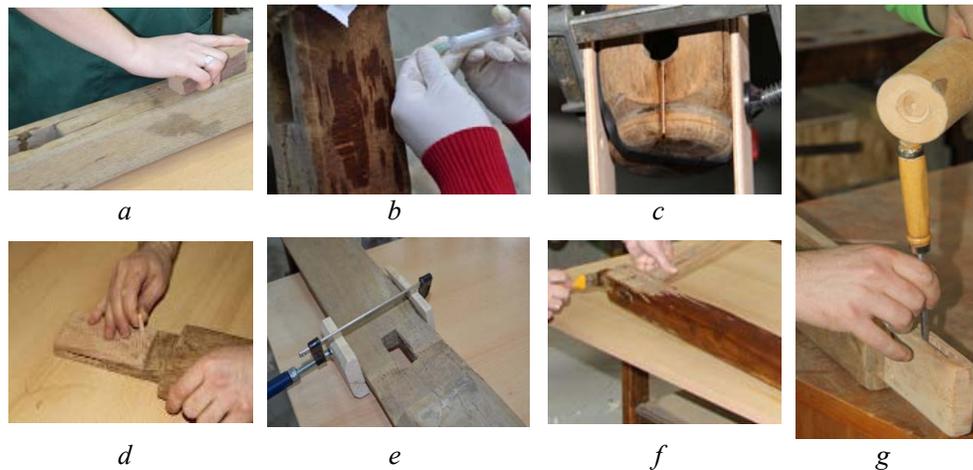


Fig. 4. Aspects from the conservation-restoration schedule: a) sanding; b- injecting insecticide; c) remediation of a crack; d, e ,g) – structural repairs of joining elements; f – preventive bio-protection and chromatic integration with Romalit N

After completing the restoration of all the original elements, these were assembled following the scheme in Fig.2 and the old loom was reconstituted. The loom was almost complete, the parts missing being the frame heddles and the original, dimensions matching reed. The

restored loom, completed with the missing parts, was exhibited at the annual restoration show of the Faculty of Wood Engineering (April –June 2013) (Fig. 5a) and at the Etnovember Festival (November 2013 – Aula of *Transilvania* University) (Fig. 5b).



Fig. 5. The restored loom in exhibitions: a) “12 for a war – a peace mission“ (April-June 2013); b) “The Restoration School in Braşov - fairy tails files” within ETNOVEMBER festival (November 2013); c) the warriors emblem and logo

4. Conclusions

Conservation of cultural heritage should be a constant concern of the entire community. This implies information, education and actions to raise public awareness of cultural heritage and how important it is to preserve it for the generations to come. Consciousness leading to a right attitude and further to action is the necessary succession of steps for a successful approach. The importance of involving young people in different, adequate programs aiming at these goals is obvious and voluntary actions for cultural heritage conservation prove to more than beneficial.

Following a sustained effort of a team of enthusiastic volunteers under professional guidance, a pile of abandoned wooden elements from a wooden loom were recovered, identified, investigated, preserved

and restored in accordance to the general principles and ethics of conservation, the old object being finally reconstructed.

Moreover, the restored object and the action itself were valorised by two exhibitions which gathered an important number of visitors, so that the entire action *12 for a war – a peace mission* defined itself as an action performed to raise public awareness of the importance and possibilities of conservation of cultural heritage.

The exhibitions were a moment of joy and satisfaction for the volunteer team, a time of peace after a successful battle against degradation, oblivion, indifference. A symbolic “*Peace treaty*” was signed by all the warriors, stating not only the satisfaction for this accomplished mission but also their commitment to be ready for new missions, as winning a battle does not mean winning the whole war.

We do hope that this kind of actions will contribute to the creation of a right attitude and less cultural artefacts will be abandoned to be lost forever.

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