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Shoe-Making of Agra The craft of leather

The craft of leather by Sakshi Gambhir IDC, IIT Bombay

Source:

- 1. Introduction
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Shoe-Making of Agra

The craft of leather by Sakshi Gambhir IDC, IIT Bombay

Source:

http://www.dsource.in/resource/shoe-making-agra/introduction

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Introduction

The legendary city of Agrareserves space in the memory of historians, architects, industrialists and ofcourse tourists from the world over. The city is famous for its leather craft, marble carving and the legendary TajMahal, which is one of the seven wonders of the world. Leather footwear of Agra is known internationally for superb craftsmanship. Completely handmade shoes are a class apart. No other place in the world does this trade related activity in a day more than Agra - more than one million shoes are being sold in the city every day.



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Place

Agra is located on the banks of river Yamunain the northern stateof Uttar Pradesh. Unlike the bigger cities of the country, Agra still has the old world charm and there's an amazing simplicity about its people. Most of the inhabitants are involved in the crafts either directly or indirectly. India ranks second among the footwear producing countries next to China. While leather shoes and uppers are concentrated in large-scale units, the sandals and chappals are produced in the household and cottage sector. These are sold to domestic whole-sale buyers or exported. The leather skins are sourced from tanneries in Chennai (goat and sheep), Kanpur (baffalo) and Jalandhar (baffalo and cow). The difference is in their texture, thickness and color.



On the streets of Agra city



On the streets of Agra city

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On the streets of Agra city



On the streets of Agra city



On the streets of Agra city



On the streets of Agra city

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The entrance to one of the shoe manufacturing units



Ladies footwear samples displayed in one of the factories



Lots of metal die



Tin stencils for cutting the shapes in leather

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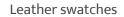
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Leather swatches







Lasts and finished shoes. Ghotul near gadhbengal

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Lasts and finished shoes.

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People

Though the craft of shoe-making is labor intensive, the karigars of Agra are carrying the tradition forward. Most of them belong to the Muslim community or the scheduled castes. While some people fabricate and sell shoes under their own label, maintaining their own identity and regular inflow of work, some 'produce' them for large international brands.



A shoe-making craftsman at the manufacturing unit



Shoe-making craftsmen at the manufacturing unit

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Shoe-making craftsmen at the manufacturing unit



Shoe-making craftsmen at the manufacturing unit



Shoe-making craftsmen at the manufacturing unit



Shoe-making craftsmen at the manufacturing unit

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Shoe-making craftsmen at the manufacturing unit



Shoe-making craftsmen at the manufacturing unit

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Process

A shoe consists of:

- Insole (the interior bottom of a shoe, which sits directly beneath the foot).
- Outsole (the layer of the shoe that is in direct contact with the ground).
- Midsole (layer that lies between the outsole and the insole for shock absorption).
- Heel (rear part at the bottom of a shoe).
- Vamp (upper part of a shoe that helps in holding the shoe onto the foot).



Manua



Mechanical

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Manual

Shoes are either completely hand-crafted or produced with the help of high-end machines. In either case, the production unit would have mainly four departments in which a progressive route is followed:



Cutting



Lasting



Closing



Finishing

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Cutting

In this department, the top part of the shoe, called 'vamp' or 'upper', is made. Firstly, the mean (area of the 'last') is calculated and various shapes that will take the form of 'upper' are drawn on paper. These are used as guidelines to cutleather skins using metal strip knives. Sometimes a tin stencil is made for karigars who are not very confident about using paper stencils. Cutting essentially requires a steady hand and lots of practice. These parts can also be die-cut when the quantities are substantial. Once the parts are cut out, they are laminated with thin foam using 'doodh' (a chemical mix that works as superglue). This is called cushioning the leather and gives it strength.







Tin stencils

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Tin stencil being used to cut the shapes in leather



Tin stencil being used to cut the shapes in leather



A more experienced craftsman cutting with a paper stencil

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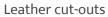
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Leather cut-outs



'Doodh' - a chemical mix that works as a superglue



Leather being cushioned

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Leather cut-outs

Waste leather strips after cutting the shapes

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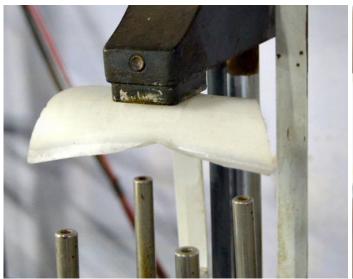
Source:

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- 1. Introduction
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Closing

Here the component pieces are sewn together by highly skilled machinists so as to produce the completed upper. The work is divided in stages. In early stages, the pieces are sewn together on the flat machine. In the later stages, when the upper is no longer flat and has become three-dimensional, the machine called post machine is used. Various edge treatments are also done onto the leather for giving an attractive look to the finished upper. At this stage only, the eyelets are also inserted in order to accommodate the laces in the finished shoes.



A patch being prepared to be attached to the upper



The patch being attached to the upper

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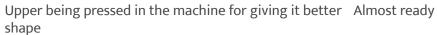






The patch being attached to the upper







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Ready uppers

Uppers, numbered and stacked to be lasted

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Lasting

The completed uppers take the shape of a foot with the help of a 'last'. Last is a plastic or wooden mould that simulates the shape of a foot. Firstly, an insole is attached to the bottom of the last. The upper is stretched and molded over this. Parts of the vampare glued to the surface of the insole visible at the bottom. These parts are rubbed off with a wire brush to take off the smooth finish of the leather. This process is called skiving and is done because rough surface absorbs and bonds with glue better. The soles are usually cut, finished and prepared as a separate component so that when they are glued to the lasted upper, the result is a complete shoe. The last is removed from the finished shoe to be used further in making other pieces.





Insoles Insoles

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A pair of lasts







Insole attached to the bottom of the last

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Nails (are used to fit the upper on the last for only the sample shoe, the rest of them are glued)



Upper being lasted







Upper being lasted

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The lasted upper



Parts of the upper glued to the surface of the insole visible at the bottom



The lasted upper



The lasted uppers

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The lasted uppers



Parts being rubbed offto make the leather rough (called skiving)



Adhesive being applied



Sole being glued to the lasted upper

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Sole being glued to the lasted upper



Sole being glued to the lasted upper



The ready 'lasted' shoe



Last being removed from the finished shoe to be used in making other pieces

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Last being removed from the finished shoe to be used in making other pieces

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Finishing

The finishing of a shoe includes trimming and buffing of the sole edge and heel. To give these an attractive finish and to ensure that the edge is waterproof, these are stained, polished and waxed. The bottom of the sole is often lightly buffed and different types of patterns are marked on it. An internal sock is fitted into the shoe. These usually have the manufacturers details or the brand name (whichever is applicable). Laces and shoe care instruction tags are attached to the shoes, which at last, get packaged in boxes.





Bijli stitch

Bijli stitch

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Bijli stitch







Sequins being stitched on the embroidered fabric

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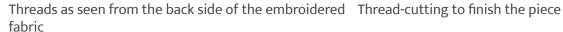


Sequins being stitched on the embroidered fabric



Sequins being stitched on the embroidered fabric







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The branding on the shoe box

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Mechanical

Changes in the footwear manufacture process have brought about traceable and tangible mechanization in the industry. Though these machines still need men to make them function, they have tremendously brought down the workload and multiplied the production. Each machine is taken care of by a specialized person who performs the task with it and passes the shoe on to the next - almost like an assembly line production. There are machines to do everything from pressing the lasted shoe at the right temperature and pressure to sterilizing it, moistening it, polishing it etc. The finish and detailing of these machines are remarkable.



The machine that presses the upper



The machine that presses the upper

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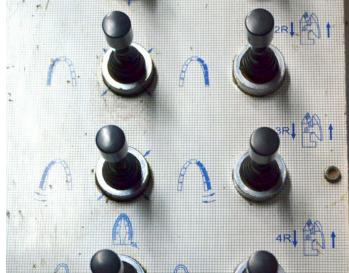
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The machine that presses the upper



High end machines



Control knobs of the machine



Parts of the machine

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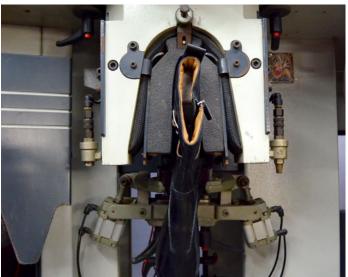
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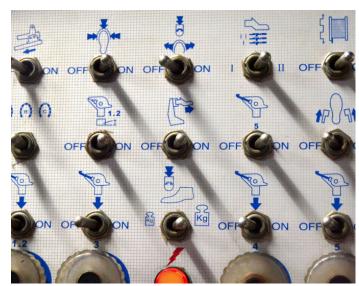
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An upper of a boot being pressed



High end machines



Garments being starched



Difference between a machine-pressed and unpressed upper

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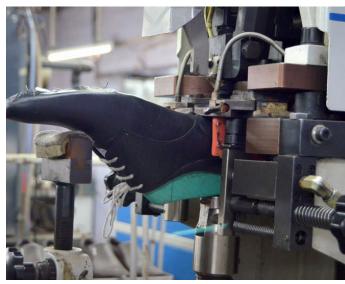
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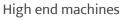
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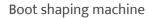






The display







Moistening machine

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Moistened shoe being rubbed for shine



Sanding machine



Another tool of the sanding machine

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The base of the lasted upper being rubbed off



Machine that dries off the adhesive just right enough to stick well



The heel and the edge of the sole being cleaned



Almost ready

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Pairs of finished shoes

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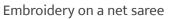
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Products

The footwear manufacturing units in Agra make everything - infant shoes, chappals, sandals, sport shoes and boots. A whooping sixty million per annum production is cost effective too. Apart from catering well to the domestic market, footwear and shoe uppers are being exported to Europe and other foreign countries too. Garments, purses, wallets, belts are other products being made in the city, well known for their craftsmanship and quality.







A crepe kurti

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Cotton kurtis







A crepe kurti

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Design Resource

Shoe-Making of Agra The craft of leather

The craft of leather by Sakshi Gambhir IDC, IIT Bombay

Source:

- 1. Introduction
- 2. Place
- 3. People
- 4. Process
- 5. Products
- 6. Contact Details



Cotton kurtis

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http://www.dsource.in/resource/shoe-making-agra/contact-details

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Contact Details

This documentation was done by Professor Bibhudutta Baral, Divyadarshan C. S. and Vijay G. at NID R&D campus, Bengaluru.

You can get in touch with Professor Bibhudutta Baral at Email: bibhudutta[at]nid.edu

You could write to the following address regarding suggestions and clarifications:

Helpdesk Details:
Co-ordinator
Project e-kalpa
R & D Campus
National Institute of Design
#12 HMT Link Road, Off Tumkur Road
Bengaluru 560 022
India.

Phone: +91 80 2357 9054 Fax: +91 80 23373086

Email: dsource.in[at]gmail.com