

SYLLABUS
For The Trade of
LEATHER GOODS MAKER

Under.
Craftsmen Training Scheme
&
Apprenticeship Training Scheme

Revised in – 2007

Government of India
Ministry of Labour & Employment (DGE&T)
CENTRAL STAFF TRAINING AND RESEARCH INSTITUTE
EN Block, sector – V, Salt Lake,
Kolkata - 700091

**List of members attended the Trade Committee Meeting for revising the
Syllabus for the Trade of "Leather Goods Maker" under
CTS & ATS held on 10.05.2007**

<u>Sl.No.</u>	<u>Name</u> <u>S/Sri</u>	<u>Designation/Representing Org.</u>	
1.	D.N.Biswas	Dy. Director General, DGE & T	Chairman
2.	D.Chakraborty	Dy. Director , S.I.S.I. Kolkata	Member
3.	Surojit Mondal	Principal, I.T.I., Kalyani.	Member
4.	Alok Kr. Basu	Supintendent., Govt. College of Leather Technology, Kolkata-20	Member
5.	Paresh Chandra Mukherjee	Consultant Safety Products & Services.	Member
6.	Nemai Ranjan Saha	Consultant, S. R. Leather.	Member
7.	Mrs. Antara Kumar	Freya Design & Development Training Institute	Member
8.	Mrs. Aditi Ghose	Bensen Industries., Kolkata	Member
9.	T. Mukhopadhyah	Dy. Director, CSTARI	Member
10.	R.R.Mannevar	Dy. Director, CSTARI	Member
11.	Amalendu Chakraborty	Asstt. Director, C.S.T.A.R.I.	Member
12.	R.N.Manna	Training Officer, C.S.T.A.R.I.	Member
13.	P.K.Dutta	Training Officer, C.S.T.A.R.I.	Member

GENERAL INFORMATION

- | | | | |
|----|-------------------------------------|---|---|
| 1. | Name of Trade | : | Leather goods Maker |
| 2. | N.C.O. Code No. | : | 809.10, 809.20, 809.30, 809.40 |
| 3. | Duration Of Craftsmen Training | : | One Year |
| 4. | Entry Qualification | : | Minimum VIII th class examination Passed |
| 5. | Duration of Apprenticeship Training | : | Two Years (Including one year craftsmen Training) |
| 6. | Rebate to Ex-ITI Trainees | : | Full |
| 7. | Ratio of Apprentices to Worker | : | 1: 7 |
| 8. | Space Required | : | 6 Sq.ft. per trainee |

NOTE FOR APPRENTICESHIP TRAINING

1. The Practical Training Programme of Apprentices under ATS (Apprenticeship Training Scheme) should be as per the facilities available in the Establishment / Industry.
2. At the end of shop floor training, an apprentice shall appear for a final examination to be conducted at establishment level based on the actual shop floor training received by the apprentices. This examination shall comprise of assessment of work diaries maintained by the apprentices and Viva Voice to be conducted by an external examiner (other than an official directly responsible for shop floor training).

**SYLLABUS FOR THE TRADE OF LEATHER GOODS CRAFTSMAN UNDER
CRAFTSMEN TRAINING SCHEME**

Period of Training: One Year

<u>WEEK NO.</u>	<u>PRACTICAL</u>	<u>THEORY</u>
01 (1 wk)	Familiarisation with the Institute. To make the trainees familiar with the shop discipline, layout of the shop, layout of the machines, equipment, etc. installed in the shop.	Introduction to the trade. Importance of the trade in the development of the industrial economy of the country.
02 (1wk)	Type of practical training to be followed, maintenance and handling of tools and equipment of the section.	Recreational and medical facilities and extra curricular activities of the Institute (All necessary guidance to be provided to the new comers to become familiar with the working of the Industrial Training Institute system including stores procedures).
03 (1wk)	Safety precautions including fire fighting equipment, Accidents, First Aid practice and treatment.	Safety precautions. Elementary First Aid and treatment.
04 (1wk)	Identification of different hand tools used in the shop. Indenting of tools from store. Identification of different m/cs & equipments. Awareness regarding common machine faults & its remedies.	Hand tools used by a trainee in the section, their kinds, uses, names and function, process of holding. Machines and needles employed in general leather work, their nomenclature and description, operational principles and use.
05 (1 wk)	Care and maintenance of hand tools and machines and equipment. Safety precautions. Its importance, cleanliness of the shops. Sharpening of tools, scissors, knives, & other cutting tools, method and process of holding the tools.	Related Instruction – Subjects to be taught and achievement to be made. Common hand tools used by a Leather goods maker. Their kinds, uses and materials from which they are made. Their names and functions. Specification of different tools used in leather goods manufacture- their nomenclature and description. Different types of needles and part of the needle, type of cutting edges in a needle.
06 to 08 (3 wks)	Practice on Leather Cutting by hand and machine Practice of using ornamental materials Preparation of specification for ornamental materials.	Leather and other substitutes, types & essential characteristics for different uses. Their identification and selection. Their parts and suitability for various purposes. Various types of hides & skins and fancy leather skins. Their qualities and application, limitation and treatment. Oil dressed and axed leathers and their uses. Effects of water, acids, alkalis, friction and heat on leather and its substitutes. Types of finished leather (CG, PG, Fur, Suede leather, Oil pull-up, NUBUCK, NAPPA, WAXY, etc.)

09 to 13 (5 wks)	<p>Familiarisation and Operation of different machines- Clicking, Skiving (Hand m/c), splitting, lamination, punching, etc.</p> <p>Sewing practice on paper board by hand and with sewing machine.</p> <p>Stitching practice of different types</p>	<p>Uses of various types of machines. Uses of different sewing machine.</p> <p>Description of various fittings such as locks, hurdles, caners, rollers, fasteners, hinges, buckles, rivets, etc.</p> <p>Identification of plating and evaluation of their quality and appropriate uses in the manufacture of leather goods.</p> <p>Various ornamental materials and uses.</p> <p>Various types of needles, bobbins & their uses.</p> <p>Needle and thread ratios.</p> <p>Choice and purchase of raw materials and sources of supply. Fabric and coated fabrics.</p> <p>Types of stitching threads (cotton, nylon, polyester and other man made materials)</p> <p>Properties of threads and terminology – Fibres, yarn, thread no. and sizes.</p>
14 to 16 (3 wks)	<p>Cutting out, Punching and skiving straps, rug and parcel carriers, Fixing buckles, Purses, Cutting tongs, leashes, dog belt, game carriers, waste belt, key cases, optical case, vanity bags, Optical case, Camera case, money purse, hand gloves, school bags etc.</p> <p>Finding the sections of a finished job.</p>	<p>Classification of leather goods. Brief knowledge about characteristics of leather goods. Their purpose – sizes – shapes for various uses- Industrial & consumer type.</p> <p>Measurements, its principles and direction for applicable to leather work. Weights and measures. Area measurement of skins. Area measurement of patterns.</p>
17 to 21 (5 wks)	<p>Freehand sketching of basic designs of leather goods.</p> <p>Designing and the various edge treatment, folded edge, bagged edge, gimped edge & piping etc.</p> <p>Pattern making and template making for different types products.</p> <p>Preparation of pattern for upper and lining materials.</p> <p>Preparation of components.</p>	<p>Hides and skins – their structure and quality.</p> <p>Flaws and defects. Parts of hides, their names and uses. Quality and substance in different parts and their variations. Stretch in skins – its extent and direction. Curing of hides and skins.</p> <p>Tanning process – Pre tanning and Post tanning.</p> <p>Tanning of hides and skins and their types and their essential characteristics for different uses.</p> <p>Their identification and selection.</p> <p>Designing – Design and its principle. Fashion and its influence on leather work. Pattern and styles, their names and description, application and economical execution. Preparation of patterns for coin purse, wallets, hand bags, portfolio, etc.</p> <p>Specification and description of the materials used in the manufacture of various standard / tailor made leather goods. Drawing of different types of leather goods. Standard size range for different leather products.</p>

22 to 24 (3 wks)	Manufacturing of cut edged articles, Turn edged articles, Unstiffner articles, Built up articles, moulded articles.	Types of lining materials. Different grinders used for leather products. Use of synthetic materials in combination with leather used for articles. Stores used as reinforcements, their types and utility. Textile fabrics and their applications. Method of construction and their description. Cutting, punching, Edges and their kinds. Sewing operation. Fixing buckles, sears, their types and treatment. Threads – its types and uses. Seam strengths. Varieties of stitches used in leather goods. Adhesives employed in leather work, their names and description, preparation and application. Technical terms applicable to the trade, such as darji, kafai, framing, blocking, etc.
25 & 26 (2 wks)	Sequence of operations for manufacturing of various types of leather products. Cutting out and sewing holdalls, bedding rolls, valises.	Thronging by hand, types of thronging, designing, methods of colouring, etc. Use of leather thongs in leather goods. Selection of leather for various leather articles, types of leather used for different articles and their characteristics. Chrome leather, suitcase leather, embossed leather, betting leather, Leather for industry Leather goods.
27 & 28 (2 wks)	Identification & character of various leather materials	Different type of leather & their character.
29 (1 wk)	Industrial visit to Tannery and Leather goods industry	
30 to 32 (3 wks)	Making of various types of leather goods	General costing of leatherwork. Costing methods for materials by weight and by measurement.
33 & 34 (2 wks)	Economical adjustment of cutting leather and lining for various products. Preparation of cost sheet. Calculation of consumption and wastage materials.	Wastages, its proportions and limits. Waste cutting and their utilisation. Different types of treatment for storage. Preservation and storing of raw materials.
35 & 36 (2 wks)	Use of various substitute materials of leather	Different substitute materials of leather & their uses.

37 & 38 (2wks)	Antique treatment. Embossing and finishing of leather products.	Finishing processes abrasion and their description. Waxes and inks used in finishing, their names and application. Cleaning and glossing of types of leather and their methods. Marks and blemishes- identification & their character and processes for removal. Artistic leatherwork, modelling, types of modelling, embossing, embossed leather goods. Spirit colour used in leatherwork.
39 & 40 (2 wks)	Quality control and inspection of leather products.	Packing and forwarding of finished products of leather goods items.
41 (1 wk)	General maintenance of machines, equipments and Tools	General maintenance system of machines, equipments and Tools.
42 to 45 (4 wks)	General repairs of different types of leather goods.	Commercial calculations cost of finished products and their selling prices. Overhead cost and their distribution over production. Marketing of finished products. Selling methods.
46 (1 wk)	Visit to Industrial Establishment The instructor should make it convenient to accompany trainees during their visit to establishments and explain the new types of machines used, if any (as they may not be provided in ITI's) and with the help of supervisor / foreman see that the trainees observe working of the new machines that are in use.	
47 to 49 (3 wks)	REVISION OF SKILLS Pattern maker, Leather Cutter (manual & clicking), Splitting, Skiving, Stitching, Finishing	
50 & 51 (2 wks)	Practice on different machines	
52 (1 wk)	TEST	

SOCIAL STUDIES:

The syllabus has already been approved and is same for all the trades.

LIST OF TOOLS & EQUIPMENT FOR THE TRADE OF
LEATHER GOODS MAKER

(For a batch of 16 trainees)

<u>SL.</u> <u>NO.</u>	<u>NAME OF THE ARTICLES</u>	<u>QUANTITY</u>
1.	Polypropylene board 40 x 40 x 10 cm.	16 nos.
2.	Wooden block 30 x 10 x 10 cm.	16 nos.
3.	Wooden clamp (standard size)	16 nos.
4.	Steel clamp rule 300 mm	04 nos.
5.	Steel clamp rule 600mm	04 nos.
6.	Set square	16 nos.
7.	Strap cutter	04 nos.
8.	Compass	16 nos.
9.	Divider 20 mm	16 nos.
10.	Divider with scale 20 cm.	04 nos.
11.	Scissor 150 mm	16 nos.
12.	Scissors 300 mm	16 nos.
13.	Scissors for cutting zig – zag 200 mm	16 nos.
14.	Clicking Knives	04 nos.
15.	Designer Knives	04 nos.
16.	Sniper 2" – 3"	04 nos.
17.	Sniper 6"	16 nos.
18.	Hammer Big	16 nos.
19.	Hammer small	16nos.
20.	Magnetic Hammer 25 cm.	01 no.
21.	Ladies magnetic hammer 10 cm.	16 nos.
22.	Beading hammer (folding hammer)	04 nos.
23.	Mallet	16 nos.
24.	Pincers 10 cm	16 nos.
25.	Pincers 25 cm	01 no.
26.	Iron creaser doubles	16 nos.
27.	Wooden creaser single	16 nos.
28.	Wooden creaser doubles	16nos.
29.	Rampis	16 nos.
30.	Curved rampis	04 nos.
31.	Gultarash rampi	04 nos.
32.	Half moon shape rampi	16 nos.
33.	Awls	16 nos.
34.	Blunt awls	16 nos.
35.	Stitch marking awls	16 nos.
36.	Scriber	16 each
37.	Punches 1, 3, 4	04 set
38.	Punch set no. 1 to 10	01 set
39.	Revolving punches	04 nos.
40.	Punch (for punching holes in metal sheet / strip) 2 mm	04 nos.
41.	File flat rough 90 mm	04 each
42.	Stitching comb – assorted (1, 2 and 3 mm)	

43.	Cutting pliers 150 mm	04 nos.
44.	Set of screw drivers	01 set
45.	Philips screw driver set	01 set
46.	Eye.let setter with die	04 nos.
47.	Measuring tape (Cotton/plastic) - 2 meter long	04 nos.
48.	Leather thickness measuring Gauge (Micro)	02 nos.
49.	Bench vice – 100 mm	02 nos.
50.	Flat chisel 20 mm nose width	04 nos.
51.	Horns biyongi	02 nos.
52.	Heel iron Electric	01 no.
53.	French curve set	01 set
54.	Modelling tool set (Tracer & modeller bewal & tool, porker marker)	01 set
55.	Glue container and glue brushes	08 nos. each
56.	Press (Iron)	01 no.
57.	Maintenance tool	01 set

MACHINES

01.	Card board cutting machine 900 mm capacity (Power Operated)	01 no.
02.	Sewing machine tradle operated Flat bed (Single needle capacity) Power operated	04 nos.
03.	Sewing machine power operated heavy duty	01 no.
04.	Splitting machine upper	01 no.
05.	Stamping die machine	01 no.
06.	Stamping machine table type	01 no.
07.	Cylinder bed sewing machine	01 no.
08.	Post bed sewing machine	01 no.
09.	Zig – Zag stitching machine	01 no.
10.	Skiving machine	01 no.
11.	Strap cutting machine	01 no.
12.	Edge folding machine	01 no.
13.	Roller	01 no.
14.	Splitting machine bottom	01 no.
15.	Hand eye letting machine	01 no.
16.	Bottom setting machine	01 no.
17.	Inter lock machine	01 no.
18.	Edge colouring machine	01 no.
19.	Clicking machine	01 no.

FURNITURES

01.	Stools wooden high 450 mm	16 nos.
02.	Working desk	16 nos.
03.	Work benches	04 nos.
04.	Almirahs	02 nos.
05.	Show case	01 no.
06.	Instructors desk and chair	01 set

Syllabus for the Trade of "Leather Goods Maker" under Apprenticeship Training Scheme

Period of Training: 1 year

The content of syllabus during first year training for the apprentices will be same as that of the syllabus of the CTS for the trade of "Leather Goods Maker".

SHOP FLOOR TRAINING:

The operations or skills given below in this list should be learnt on the shop floor during apprentice training. The apprentices should have more practice on the shop floor on these operations or skills which have been already learnt during basic training or Craftsmen training.

The following exercises will be carried out by individual trainees under the guidance of the instructor to avoid any wastage of raw materials and will be confirmed to the production of such articles as are required for use or for which there is a ready demand in the locality, in order to eliminate accumulation of stocks :-

1. Practice in care and maintenance of hand tools.
2. Kit cutting.
3. Sewing leather by hand and with sewing machine.
4. Pattern cutting and template making for different types of articles.
5. Comprehensive training in cutting techniques both for hand cutting as well as with modern cutting machines.
6. Economical adjustment of cutting leathers and lining for various products.
7. Splitting of leather to desired thickness.
8. Skiving – Both hand skiving and machine skiving.
9. Cutting out, punching and skiving straps, rug and parcel carrier, fixing buckles, purses, cutting thongs, leashes, dog whips, game carriers, etc.
10. Various methods of assembling, cementing and closing of finishing.
11. Training on various types of sewing machines and finishing.
12. Leather craft work like embossing, thronging, binding tooling, etc. and production of tooled articles like belts, purses, key case, comb, etc.
13. Further practice in making of small leather goods like money purses, wallets, belts, key cases, school bags, shoulder bags, etc.
14. Cutting and sewing holdalls, bedding rolls, valises.
15. Making of hand bags, despatch cases, and Gladstone bags, suitcases, leather trunks, zipper cases, document cases, attaché cases, school bag etc.
16. General repair work.

As soon as the trainee has acquired the requisite degree of skill in the trade, he should undertake to cut, stitch and finish leather goods of various kinds, such as straps, rugs and parcel carriers, dog whips, holdalls, bedding rolls, lady's purses, doctor's bags, sachets, etc.

RELATED INSTRUCTION – TRADE THEORY:

Materials used as reinforcements, Their types and utility and other fittings and their application.

Methods of construction and their description, cutting, punching edges and their kinds, sewing operations. Fixing - its types and their uses. Seam strengths, stitches used in closing. Adhesives used in leather work, their names and description. Preparation and application, technical terms applicable to the trade such as dargai, kafai, framing, blocking, etc.

Brief knowledge about characteristics of leather goods. Classification of leather goods. Their purpose - sizes – shapes for various uses – Industrial and consumer type.

Finishing processes (abrasion) and their description. Waxes and inks used in finishing, their names and application, cleaning and glossing different types of leather and their methods. Marks and blemishes, their character and processes for removal.

Measurement its principle and direction applicable to leather work, weights and measures. Area measurement of skins. Area measurement of patterns.

Fibre structure and basic knowledge of physical properties. Synthetic materials and polymers (definition, types of polymers).

Designing – Design and its principle. Fashion and its influence on leather work generally. Patterns and styles, their names and description, application and economical execution.

Choice and purchase of raw material and sources of supply. Wastages and its proportions and limits, waste cutting and their utilisation.

General costing of leather work by weight and by measurement. Commercial calculations, costs of finished products and their settling process. Overhead costs and their distribution over production.

Marketing of finished products, selling methods.

DESIGN DEVELOPMENT

Design and pattern making, introduction to modern tools of production , different types of leather used for making various types of leather goods and their properties, various types of adhesives used, various types of fittings used, various types of foundations used, various types of linings used, various types of threads used, economic layout of patterns for minimising wastage. Basic knowledge in manufacture of garments.

FABRICATION

Introduction to various methods of production. Use of simple as well as sophisticated machines in order to improve quality of products and increase productivity.

Comprehensive training in cutting techniques both for hand cutting as well as with modern cutting machines – various methods of assembling , closing and finishing – training on sewing machines of various types used in leather goods manufacture.

MACHINE SHOP

Training in installation and maintenance of machinery – designing of modern jigs, making template fittings and tools for more efficient production. Instruction in preventive maintenance system. Inventory and spare parts control.

1. The first part of the document is a letter from the President of the United States to the Congress, dated January 1, 1861.

2. The second part is a report from the Secretary of the Treasury, dated January 1, 1861, on the state of the Treasury.

3. The third part is a report from the Secretary of the Interior, dated January 1, 1861, on the state of the Interior.

4. The fourth part is a report from the Secretary of the Navy, dated January 1, 1861, on the state of the Navy.

5. The fifth part is a report from the Secretary of the War, dated January 1, 1861, on the state of the War.

6. The sixth part is a report from the Secretary of the State, dated January 1, 1861, on the state of the State.

7. The seventh part is a report from the Secretary of the War, dated January 1, 1861, on the state of the War.

8. The eighth part is a report from the Secretary of the War, dated January 1, 1861, on the state of the War.

9. The ninth part is a report from the Secretary of the War, dated January 1, 1861, on the state of the War.

10. The tenth part is a report from the Secretary of the War, dated January 1, 1861, on the state of the War.