


Tec  
5398  
15

WIDENER  
  
HN QTY7 7

Mickel - Leather work - 1850



*Tec 5398.15*

HARVARD COLLEGE  
LIBRARY



GIFT OF THE  
GRADUATE SCHOOL  
OF EDUCATION



HARVARD UNIVERSITY  
GRADUATE SCHOOL OF EDUCATION  
VOCATIONAL GUIDANCE COLLECTION

ARTS AND CRAFTS  
WORKBOOK















# LEATHER WORK

By ADELAIDE MICKEL  
Department of Manual Arts  
Bradley Polytechnic Institute  
PEORIA, ILLINOIS



THE MANUAL ARTS PRESS  
PEORIA, ILLINOIS  
1915



V. 22. 2. 15

MS. 8. 4

**HARVARD UNIVERSITY  
DIVISION OF EDUCATION  
BUREAU OF VOCATIONAL GUIDANCE**

HARVARD COLLEGE LIBRARY  
TRANSFERRED FROM THE  
LIBRARY OF THE  
GRADUATE SCHOOL OF EDUCATION  
1933

Copyright  
ADELAIDE MICKEL  
1913  
Second Edition, 1915



## P R E F A C E

---

**A**S ONE of the art crafts, leather-work is receiving much attention in our public and private schools. It affords an excellent opportunity for art expression and for the training of the hand and eye.

This book is intended to be of practical assistance to teachers and students in acquiring the technique of the various kinds of leather-work.

Detailed descriptions of the different processes of working, with many working drawings and photographs of objects suitable for school and home work are given; also suggestions for problems appropriate for the different grades in the elementary school and in the high school.







## C O N T E N T S

I	Equipment	-	-	-	7
II	Flat Modeling	-	-		9
III	Embossing or Repousse			-	13
IV	Carved Leather			-	17
V	Cut -Work	-	-	-	21
VI	How to Color or Stain Leather				23
VII	A Card-Case	-	-	-	25
VIII	A Bill-Book	-	-		27
IX	A Coin-Purse			-	31
X	Flat Modeled Hand-Bag			-	33
XI	Opera-Bag of Cut -Work			-	35
XII	Gentleman's Handkerchief-Case				37
XIII	One-Piece Hand-Bag	-	-		39
XIV	To Sew Leather	-	-		41
XV	Problems for the Grades			-	42
XVI	Problems for the High School				43





Fig. 1. Card-Case. Example of Stippling.

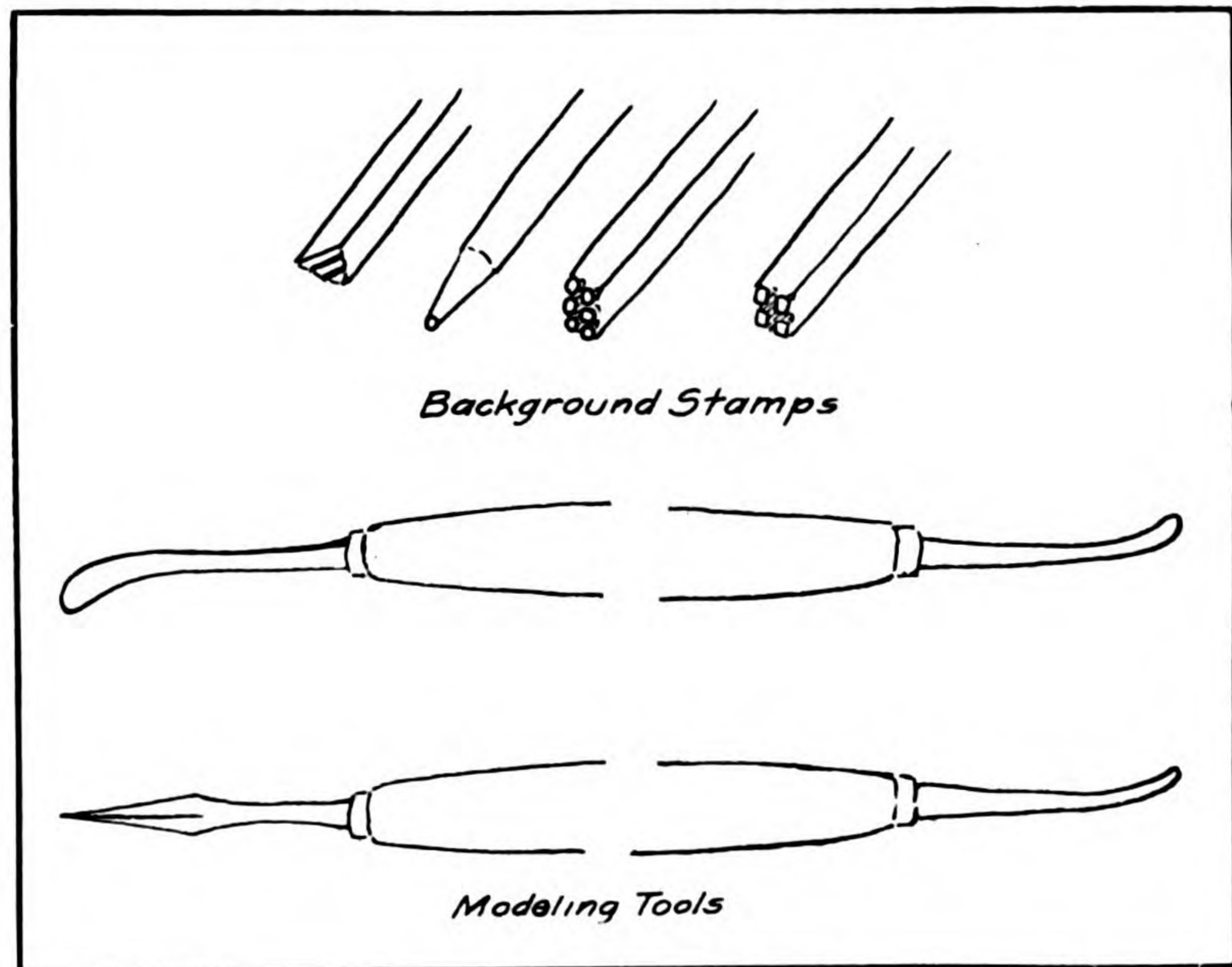


Fig. 2. Modeling Tools.



## 1. EQUIPMENT.

Leather-work is one of the best crafts for beginners. It is very easily handled, and requires but a small equipment. Many useful and beautiful articles can be made from leather; therefore, the work is well worth while.

The necessary tools are inexpensive and few in number. The simplest tool is a knitting needle, which makes a very good tracing tool and can also be used for a stippling tool for backgrounds. See Fig. 1. Inexpensive nut-picks can be converted into modeling tools by flattening the under side of the nut-pick on a grindstone, keeping the tool as broad as possible and the end of the tool with a thin well-rounded edge.

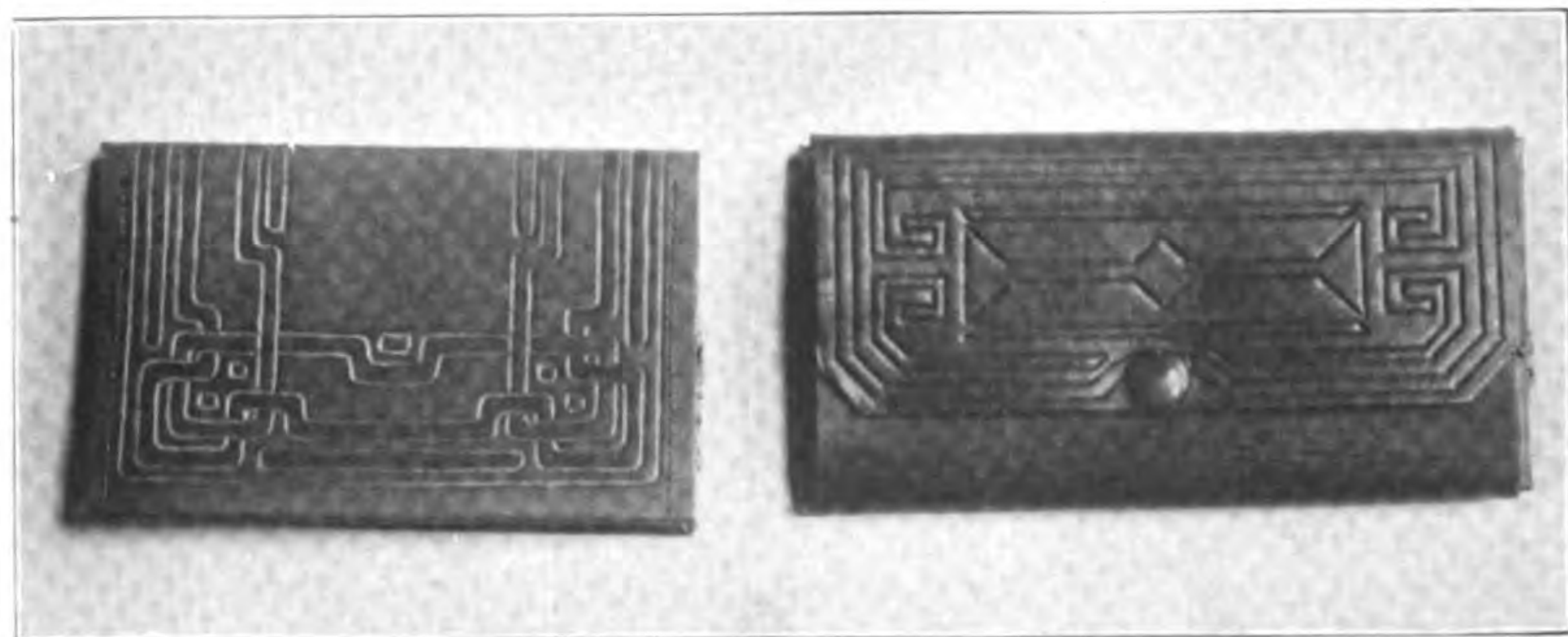
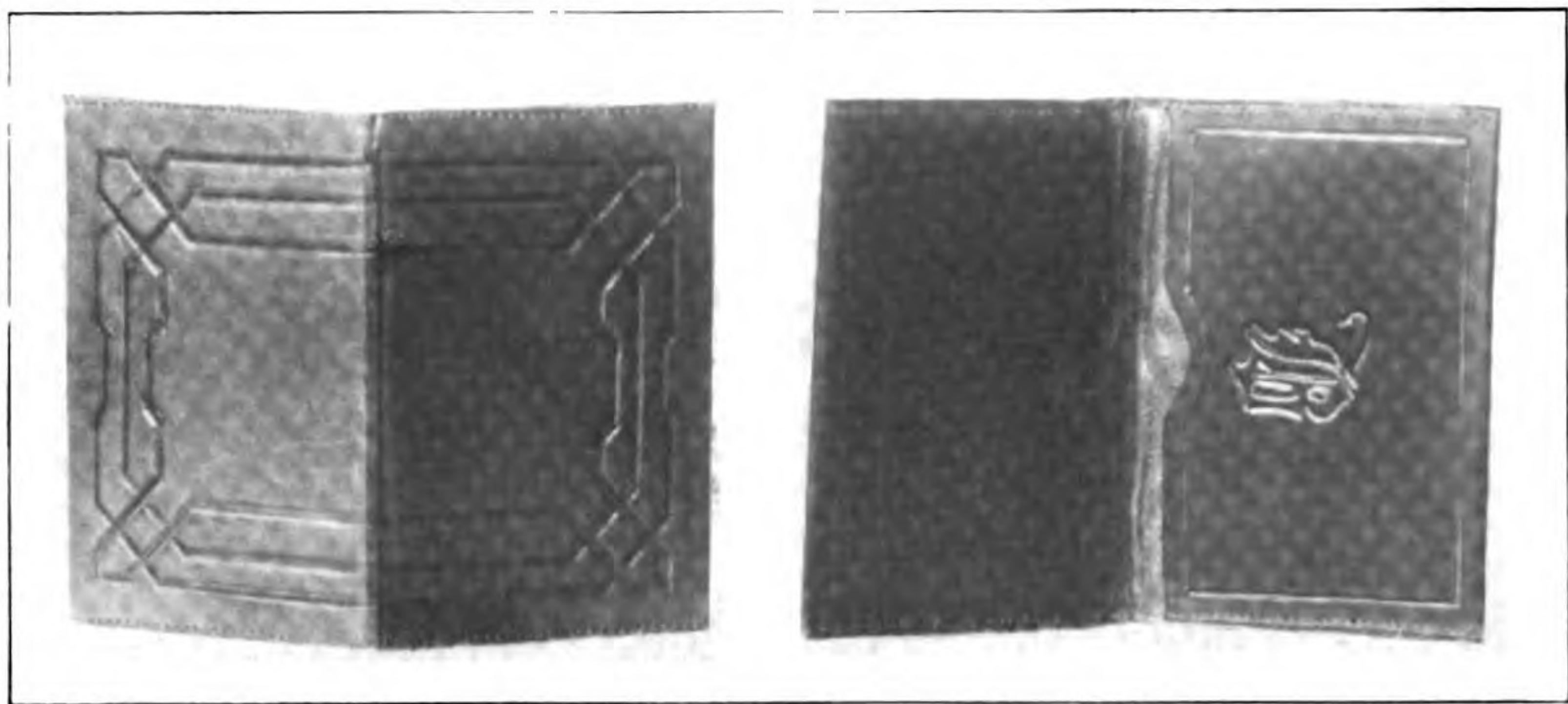
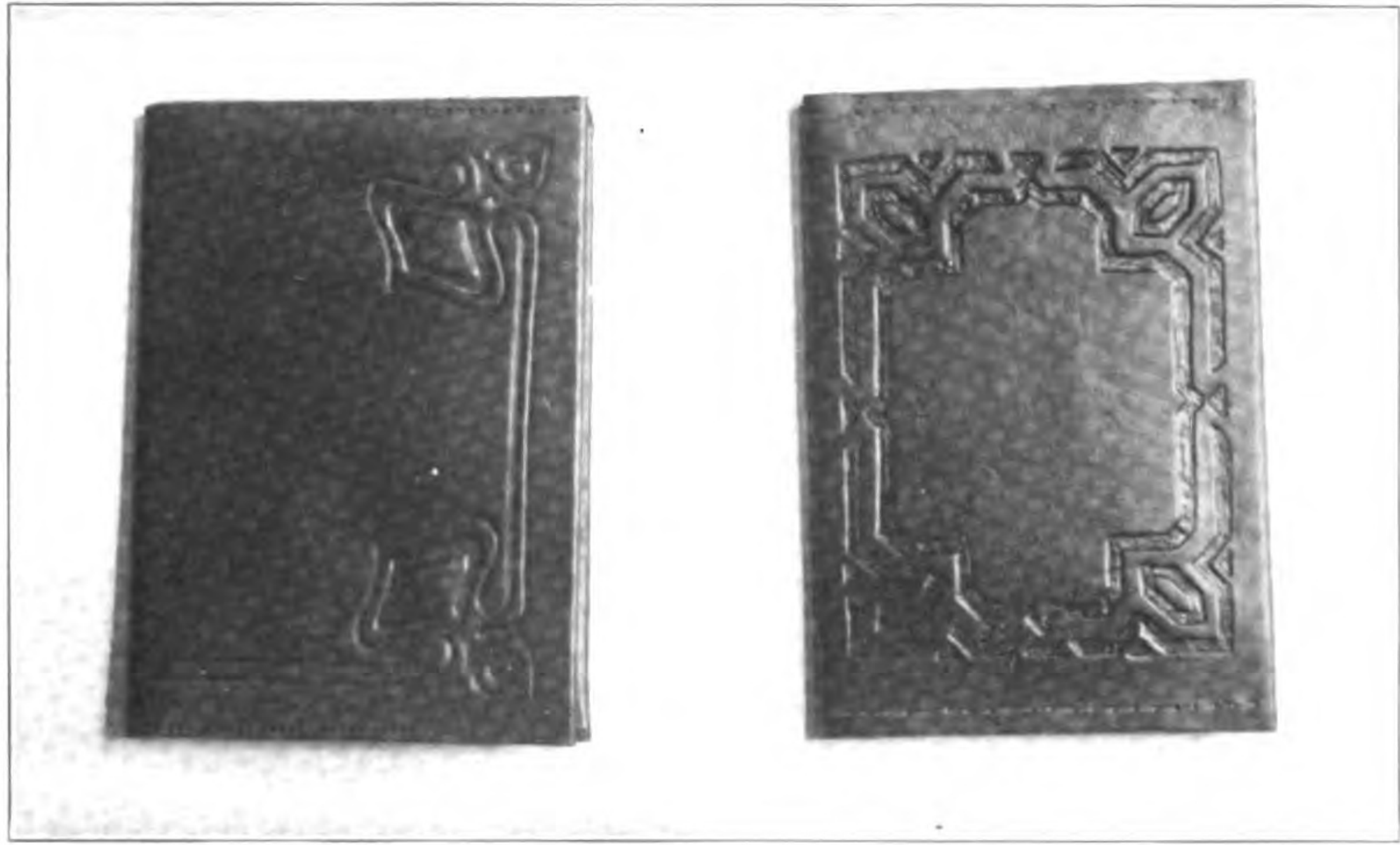
For the outlining or tracing tool, grind the nut-pick on the under side so that it will be three cornered and come to a point, being careful not to have the edge or point of this tool sharp enough to cut the surface of the leather. These tools should be finished on an oil-stone.

Other tools, to be used in stamping the background, may be made by filing simple devices upon the end of a wire nail. There are numerous good modeling tools on the market that can be purchased at a moderate price. See Fig. 2. A slab of marble, slate, or glass, a triangle, a one-foot rule, a soft sponge, sharp knife for cutting, and thumb-tacks complete the list.

A glove-fastener outfit is very desirable if one expects to use the fasteners on purses or on belts. These fasteners can be had in different colors.

Good leather is essential if good work is to be accomplished. Different leathers are suited to the different methods of decoration. Ooze calf, sheep, and goat may be stained or used in cut work. They are too soft and pliable to be tooled and too thin to be carved. Russia calf and cowhide either with grain or ooze surface are best for modeling, carving, or stamping. Skiver is a thin leather useful for linings.





Figs. 3, 4, 5. Flat Modeling.



## II. FLAT MODELING.

The design, Figs. 3, 4, and 5, must be in harmony with the shape of the article to be tooled and also in harmony with the flat surface of the leather. The design is drawn upon a thin tough paper such as tracing paper or thin bond. If it is to be used more than once it should be drawn with ink on tracing cloth. Russia calf is the best leather for this process. Cut the piece of leather  $\frac{1}{2}$ " larger all around than the design. Moisten the leather on the glazed or finished side with a sponge. The first time the leather is wet it must be wet evenly over all of the surface, this is to prevent water marks appearing when the work is finished.

Place the leather on a drawing-board, the flesh side down, and place the tracing over the leather and fasten with thumb-tacks to the board. Place the thumb-tacks on the margin outside the design. With the tracing tool, a hard pencil, or stylus, go over all of the lines of the design. Hold the tool as you would a pencil, using sufficient force to make a distinct impression on the leather. See Fig. 6. In drawing or tracing straight lines always use the rule or triangle and move the tool from left to right; when possible draw the tool towards you.

Next, remove the tracing paper; the lines will now be imprinted upon the leather. These lines must now be gone over and impressed more deeply upon the leather. To do this place the leather without moistening it, upon a slab of marble, glass, or slate, or any hard smooth surface, and force each line more deeply into the leather with the outlining tool. All leather tooling is the same to this stage of the work.

Flat modeling is the simplest process and consists in laying down the background by rubbing its surface with the flat broad pointed tool, working in all directions being careful to work up to the line of the design, but not to work over it. The leather must be kept moist during this process by wetting it on the under side with a sponge. Do not have it so wet that the water seeps thru to the right side or it will not polish. If the leather wrinkles when being rubbed the direction of the rubbing should be changed. The leather becomes darker in color when polished which gives a most pleasing effect.

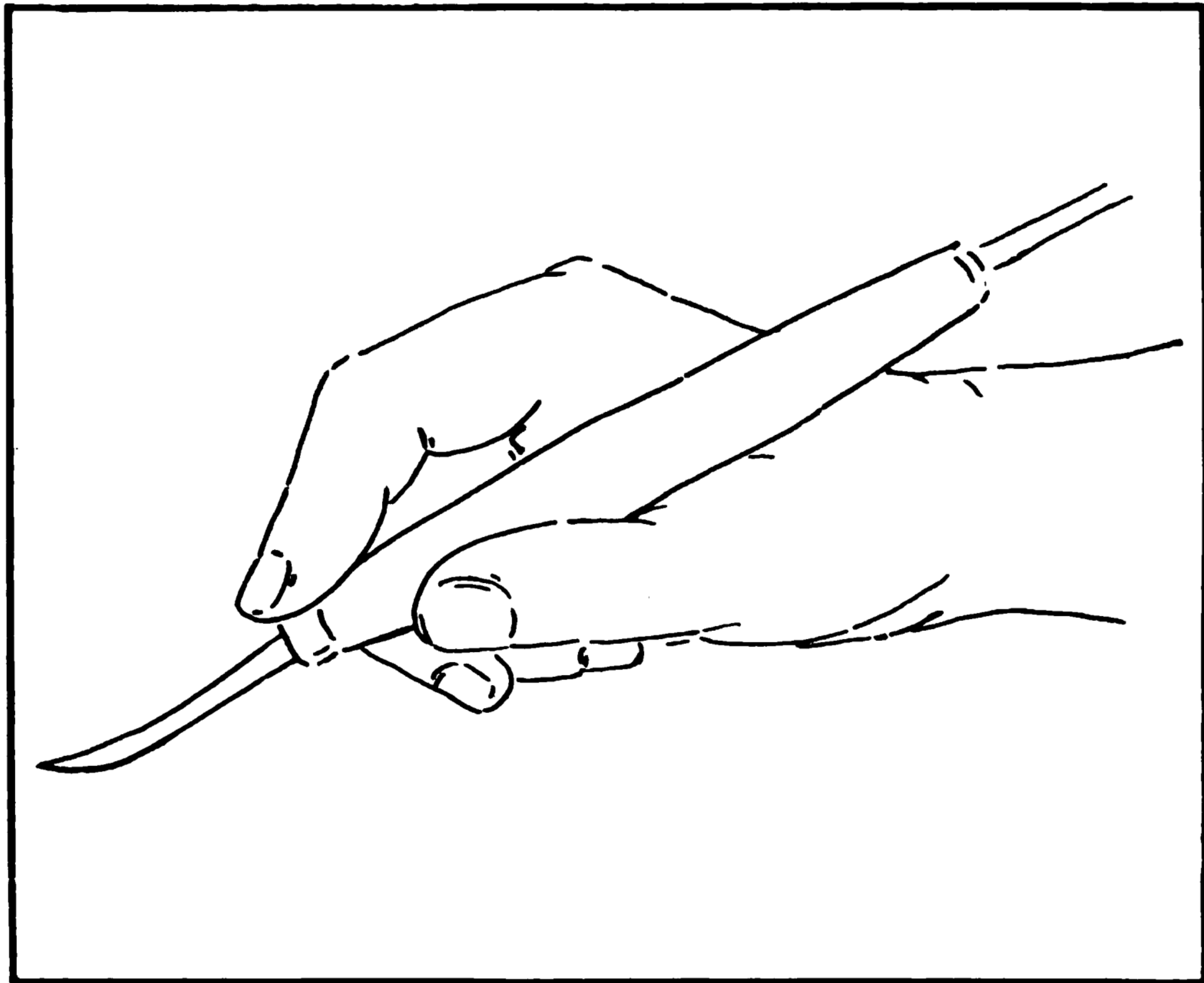


Fig. 6. Method of Holding Modeling Tool.



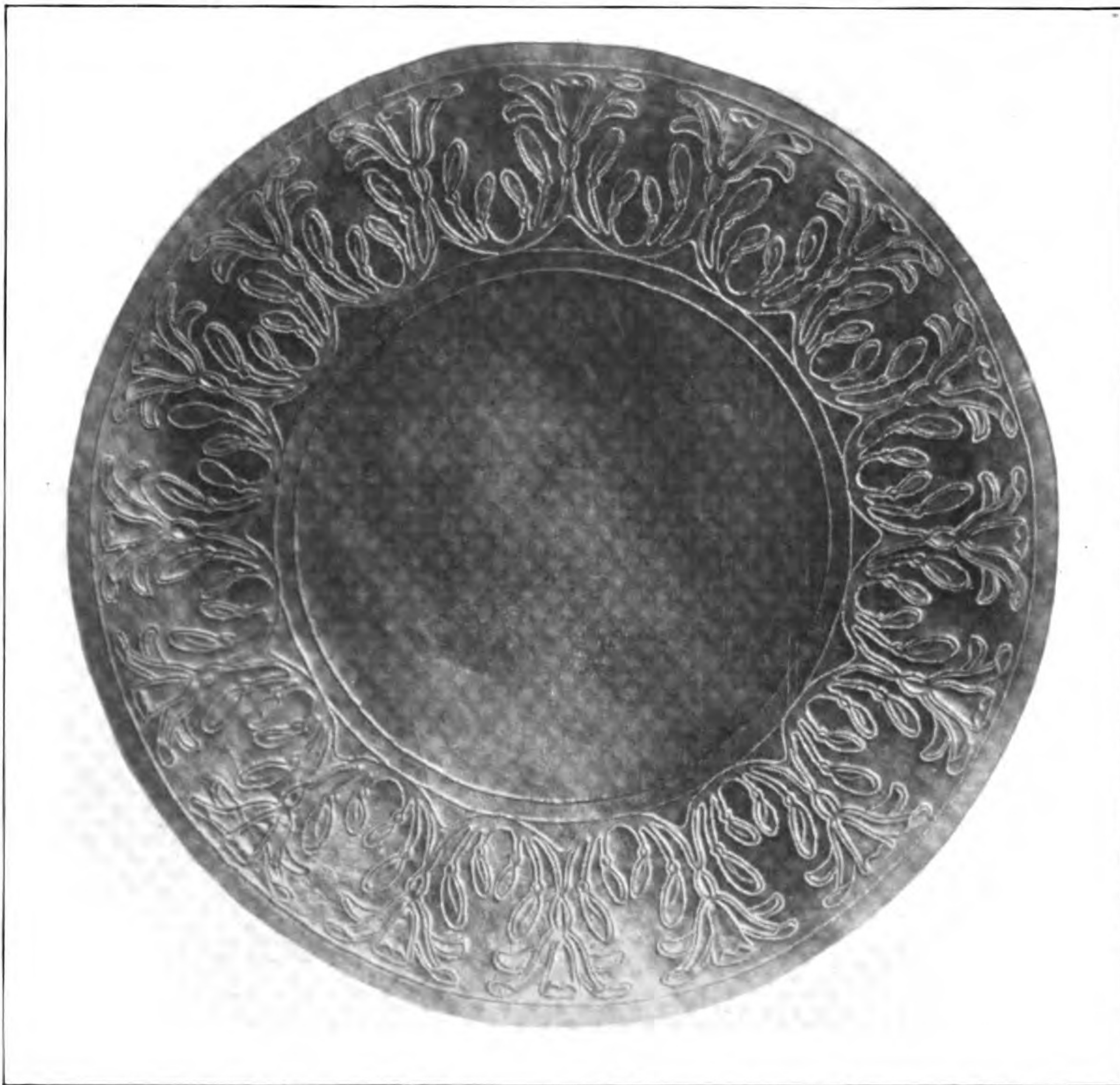
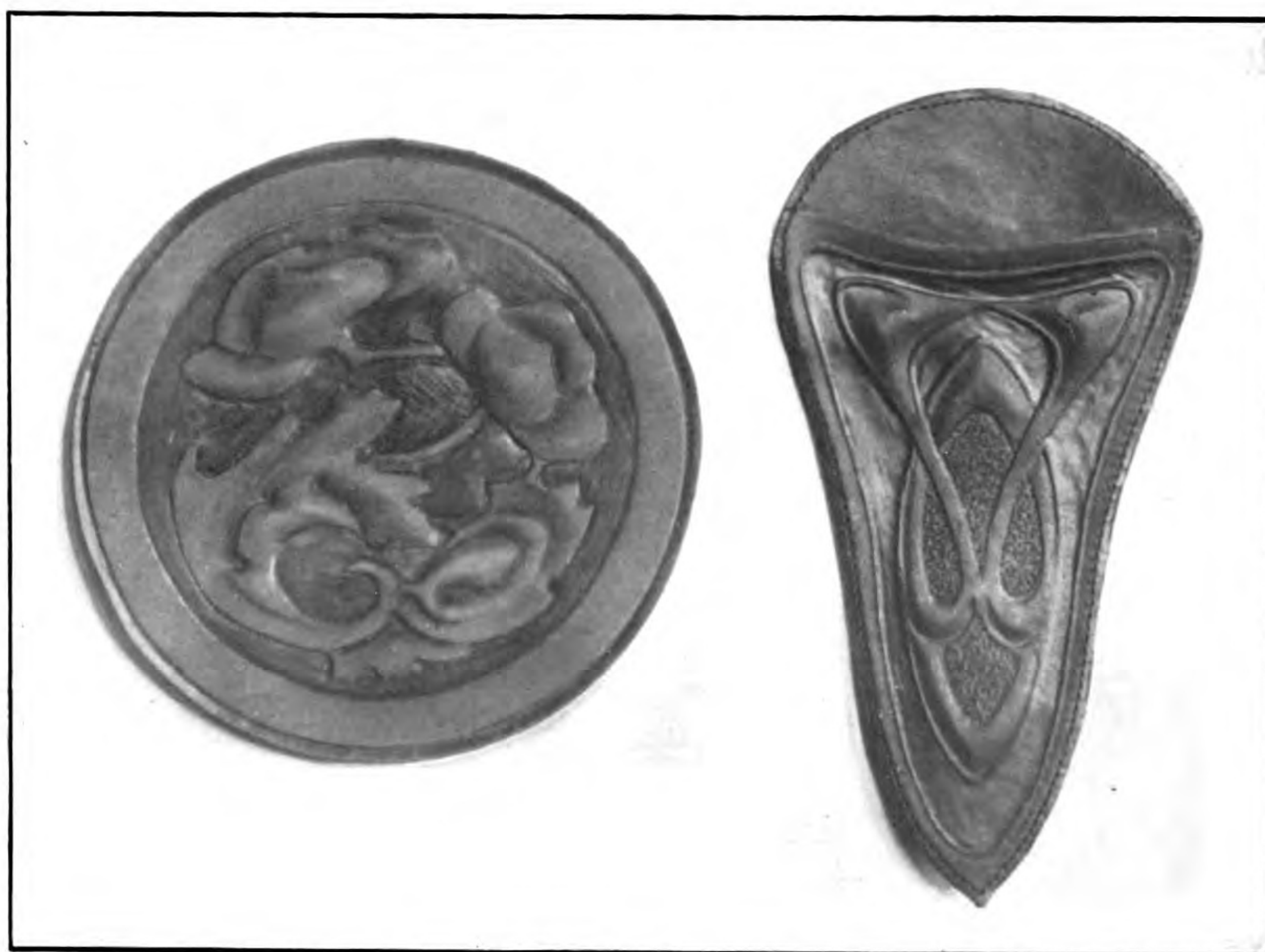
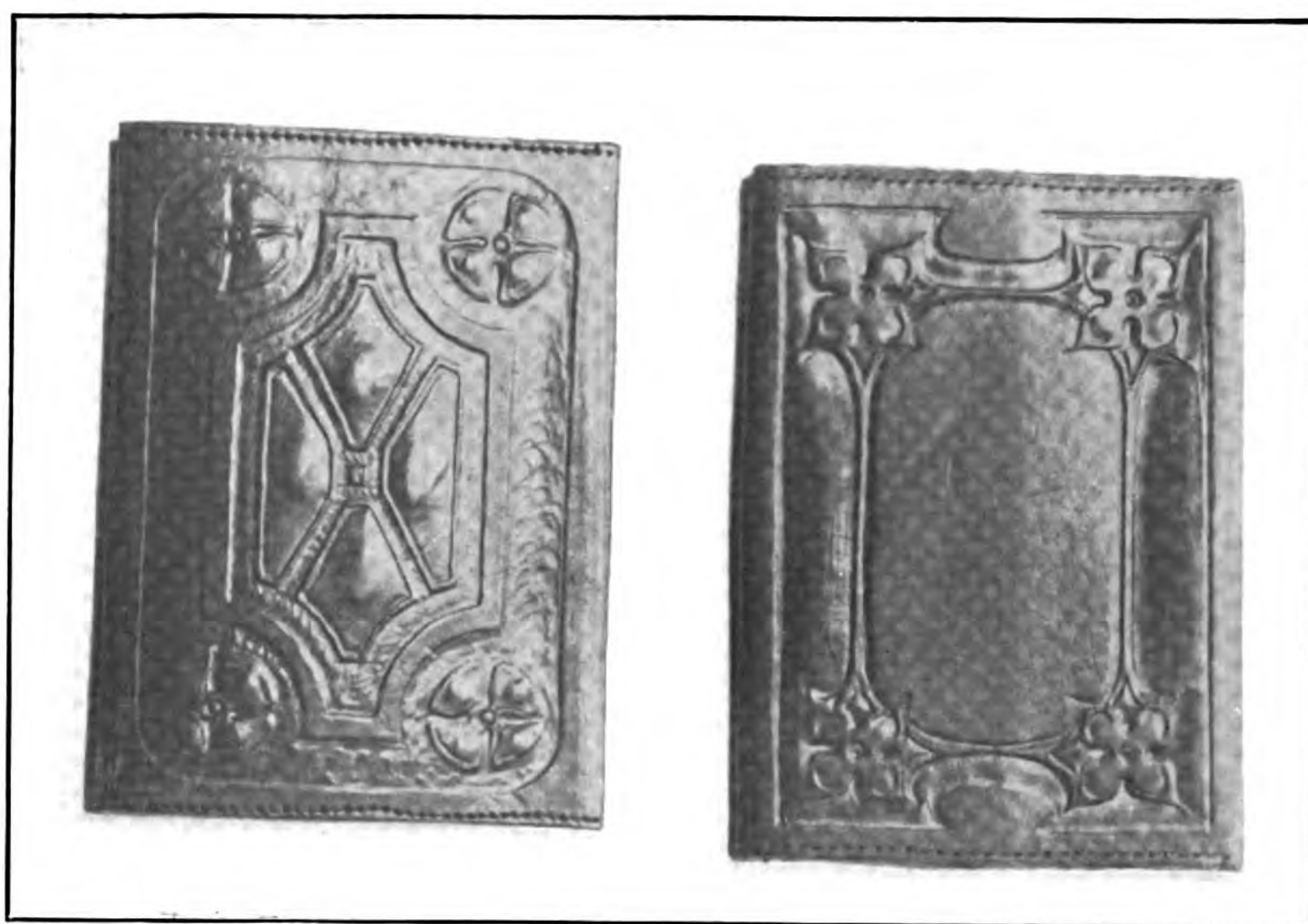


Fig. 7. Flat Modeling.





Figs. 8, 9. Embossing or Repoussé.



### III. EMBOSSING OR REPOUSSÉ.

Embossing, or repoussé, is a little more difficult than flat modeling. See Figs. 8, 9, 10. It is the process of raising leather. To do the embossing we draw the design on tracing paper as in the flat modeling. Cut the leather  $\frac{1}{2}$ " larger all around than the design. Dampen with a sponge the entire finished surface of the leather. Place carbon paper face side up on drawing-board, then place the leather finished side up over the carbon paper and the tracing paper over the leather. Fasten all to the drawing-board with thumb-tacks. Trace all the lines of the design with a hard pencil or an outlining tool. When completed remove the tracing paper and the carbon paper; the design will now be on both sides of the leather. Place the leather on a marble slab, glass, or any hard smooth surface. Go over all the lines of the design again with the outlining tool to make them deeper.

Moisten the leather on the under side, being careful not to saturate it so that the water appears on the finished surface. Hold the modeling tool, using one with a flat round point, as you would a pencil, see Fig. 6. Press down the leather close to the outlines of the design, always keeping the edge of the tool upon the line of the design. Press down the background and the parts of the design that need to be lowered. Make a clear firm line, always using care not to cut the leather. Smooth off the bevel which will be on the background by lightly passing over it with the flat side of the modeling tool. Use the small rounded tool for the small places and corners. The leather should now be moistened upon the under side and placed, face side down, upon the palm of the hand which acts as a cushion, and the parts that are to be raised should be rubbed backward and forward with a blunt end of the modeling tool. The leather can be forced up quite high if the leather is kept damp.

Next lay the flesh side down upon the marble and go over all the lines, and do any modeling that may be necessary. These steps may be repeated until the modeling is satisfactory. In tooling corners



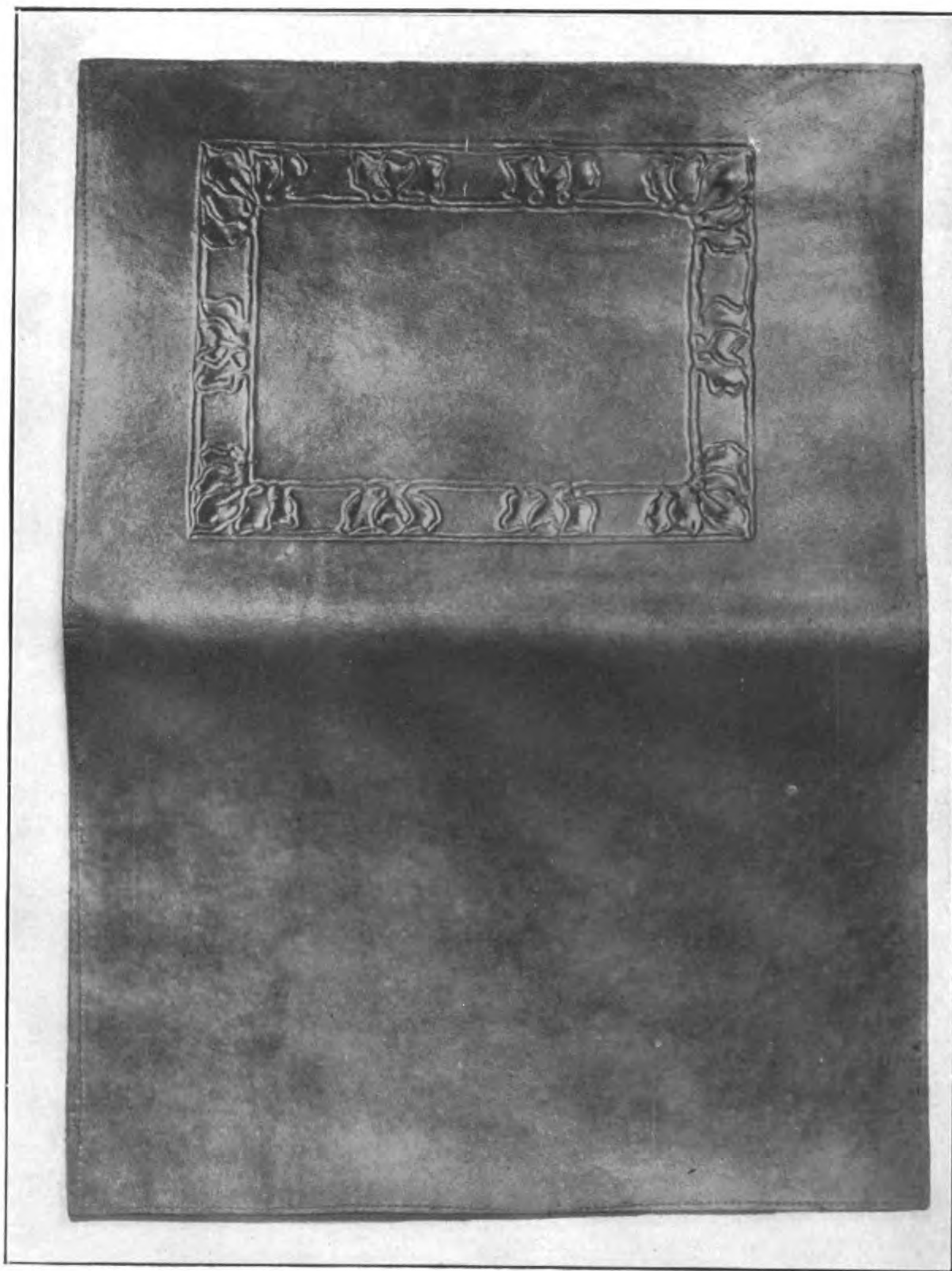


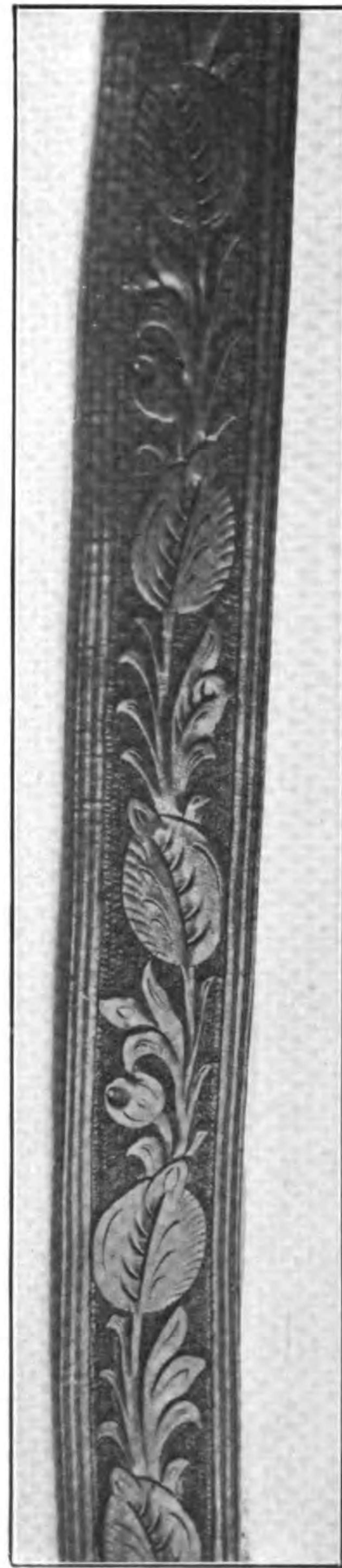
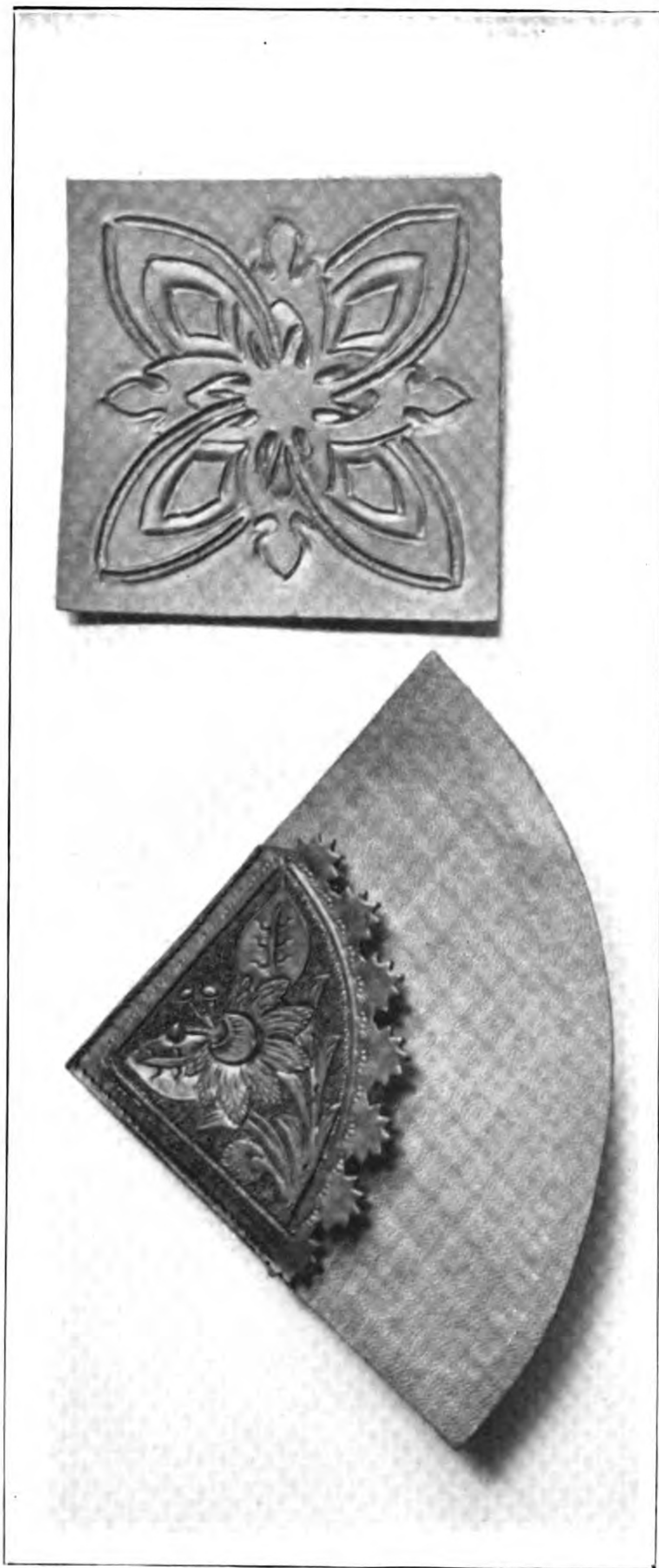
Fig. 10. Embossing or Repoussé.



one is apt to carry the lines beyond the corners. To prevent this do not draw the lines quite to the corner. Now hold the outlining tool in a nearly vertical position placing the point on the corner and drawing towards you, always draw the tool from and not toward the corner.

If the background is to be stamped place the leather, face up, on a piece of heavy strawboard and place this on the marble. Choose the background or stamping tool and holding it in an upright position strike it lightly with a hammer. These imprints should be placed close together to give an even granulated effect and should fill in all the place that is designed for the background.





Figs. 11, 12. Carved Leather.



#### IV. CARVED LEATHER.

Leather that is to be carved should be close grained and thick. See Figs. 11, 12. Uncolored cowhide is the best, being very firm. Russian calf of a heavy quality may be used. The knife used for carving the leather should have a short thin blade and a sharp point. See Fig. 13. Gouges that are used for wood carving are also useful for this work. The three sided modeling tool, and a small dull pointed tool, called an opener, are required. See Fig. 14.

The leather should first be dampened with a sponge. The design is then transferred to the leather in the usual manner. Remove the tracing paper, and go over all the lines very carefully with the small modeling or outlining tool. Dampen the leather again and place upon the marble slab. Take the carving knife in the right hand, with the fore-finger well down on the back of the blade, and the hand resting upon the leather, insert the point of the blade into the leather and cut very carefully along the line of the design. The blade should be inserted at a right angle to the surface of the leather and the incision must always be vertical except when one wants to have the edge of the leather curve over, as in the petal of a flower or leaf. Fig. 15, *a, b*.

The depth of the carving should never be more than one-half of the thickness of the leather, or less than one-fourth its thickness. If it is cut too deep it will weaken the leather and if it is too shallow it will be ineffective. It is better to leave a small space between the cuts where the lines pass thru each other. See Fig. 15, *c, d*. After the carving has been completed, spread the incision with the three sided tool, by forcing it in the cut lines, Fig. 15, *e*. If it is desired to make the carved lines appear broader or heavier use the blunt ended tool called the opener. Work the opener along each line several times. Fig. 15, *f*.

The background may now be modeled or stamped. To model the background place the modeling tool along the line of the design and press down the leather close to the outline of the design, always keeping the edge of the tool upon the cut line of the design. With the



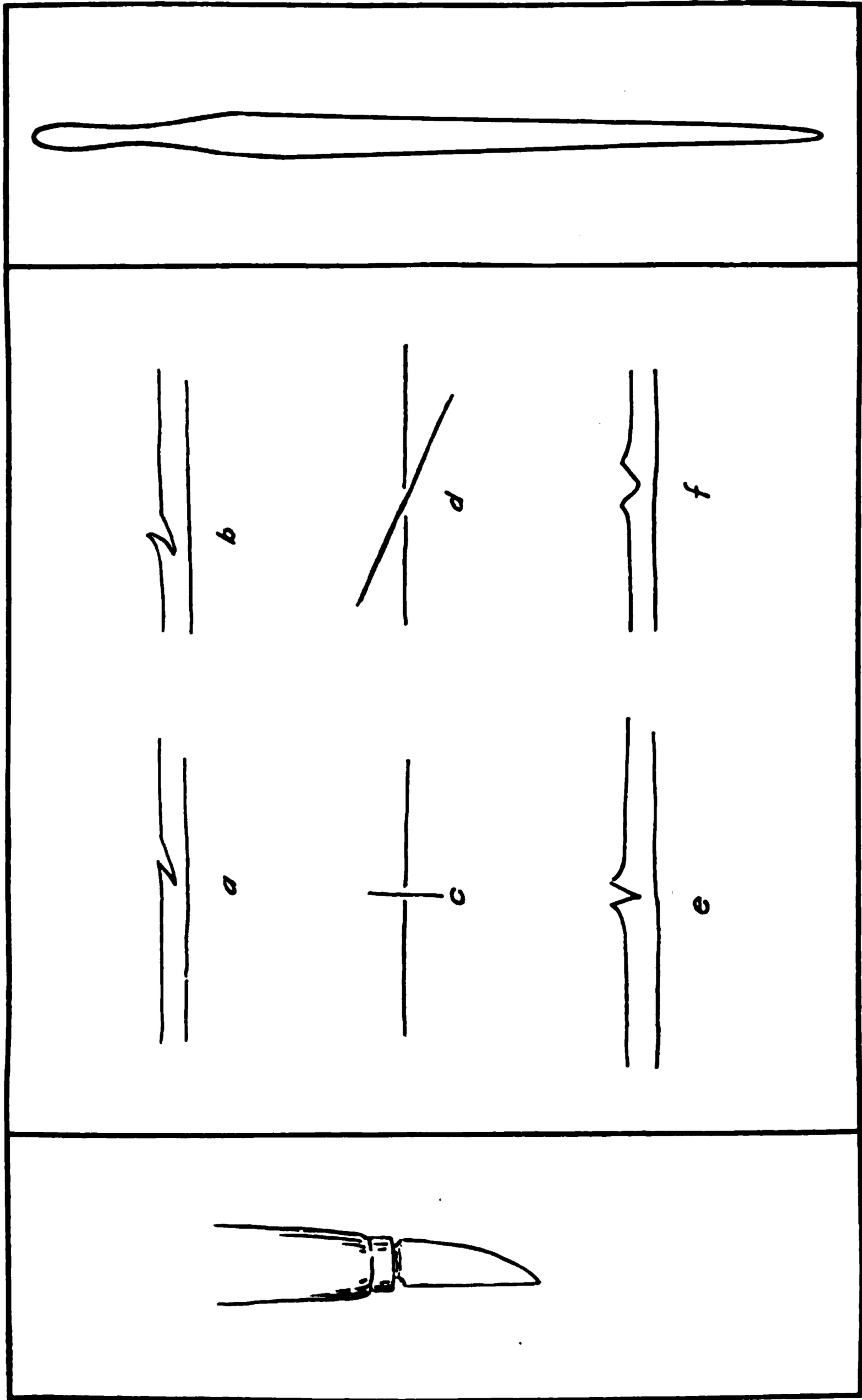


Fig. 14. Opener.

Fig. 15. Knife Cuts.

Fig. 13. Carving-Knife.



broad face of the flat modeling tool smooth off the bevel into the background. If the background is to be stamped, model the background down around the edge as just described, then place the background stamping tool close to the edge of the design and tap lightly with a hammer. The stamping must be very close together and placed so as not to form lines in the background. The leather should be kept damp thruout all the process of carving or modeling.





Fig. 16. Cut-Work.



## V. CUT-WORK.

For Cut-work, Fig. 16, the design should be a stencil design, which is one in which all of the elements are cut out, with the background remaining. Cut-work is most effective when two kinds of leather are combined, or where leather and some other material, such as silk, satin, velvet or cloth, are used. Leather having a smooth finish combines well with an ooze or suede finished leather. A very sharp pointed knife should be used, Fig. 13. Chisels and gouges may be used to advantage where the lines in the design are straight or form arcs of circles.

If the leather selected to be cut is Russia calf, dampen the leather over all the surface and transfer the design in the usual method. If ooze sheep, or ooze calf is used, transfer the design as usual but do not dampen the leather; ooze leather, excepting ooze cow, is spoiled if wet. Use the three cornered tool to mark designs on the ooze leather. Ooze sheep cannot be modeled.

After the design is on the leather, the lines should be very well defined with the modeling tool, and if any modeling is to be done on the leather it should be done at this time. Place the dry leather upon a soft wooden board and secure firmly with thumb-tacks. With the knife held in a vertical position place the point at the extreme end of the line to be cut and draw the knife toward you, using sufficient pressure to cut clear thru the leather the first time going over the line. If the gouges are used select one having the same curve as the line to be cut. Hold the gouge in a vertical position and press thru the leather. The work to be successful must have clean edges. If a thick leather like Russia calf has been used the cut edges will be of a color different from that of the surface. This edge may now be stained with dye or water color paint to match the color of the surface. It is now ready to mount.

Place the leather face side down and spread the paste thinly upon the wrong side of the leather, being careful not to let the paste get on the right side of the leather for it may stain it. Place right side up on the underlay or lining and place under a weight until dry. When the paste has dried any paste that has oozed out, while being pressed, may be removed with the point of a knife.





Fig. 17. Stained Leather.



## VI. HOW TO COLOR OR STAIN LEATHER.

Ooze or suede leather to be stained, Fig. 17, must first have the design carefully outlined with a clear distinct line. Any liquid dye may be used or water color paints if they are not too opaque. Apply the dye with a soft camel's hair brush to the part to be colored. When the dye has dried, if it is too light, apply another wash. Do not put on the second wash until the first has thoroly dried. It is best to test the colors on a scrap of the leather, for the color of the leather influences the color of the dye. When the leather is dry, scrape up the nap of the leather lightly with a paper knife or any dull edge. This gives the colored leather the same surface appearance as the rest of the leather. The design should now be outlined with a pen using India ink or a dark dye, brown is usually a good color for the outlining.

In coloring large surfaces of Russia calf or cow skin the leather must be evenly dampened on the right side and the dye applied in even washes with soft pads of cheese cloth or a very soft sponge. This is done with a patting motion going over the surface several times to make it even. If the first wash is not satisfactory it should be allowed to dry, and then given a second wash of the same color or different color, according to the color desired. Washes of one color upon another is better than to mix the dye before using. For small spaces in the design the color should be applied with a camel's hair brush. When the dye is thoroly dry the leather should be rubbed first with a soft flannel cloth, then with the palm of the hand or a chamois skin. This gives it a beautiful soft polish.

Another method of coloring a smooth leather such as Russia calf or cow skin, is to cover it with a very thin wash of dye, made by mixing oil paints and turpentine. This must be wiped off immediately with a soft cloth and then allowed to dry thoroly before polishing, which is done by rubbing with the hand or chamois skin. This method of coloring shows the grain or pores of the skin in the color of the dye applied and is to be used on colored leather.—Dye skiver or lining leather to harmonize with the outside of the article to be lined.



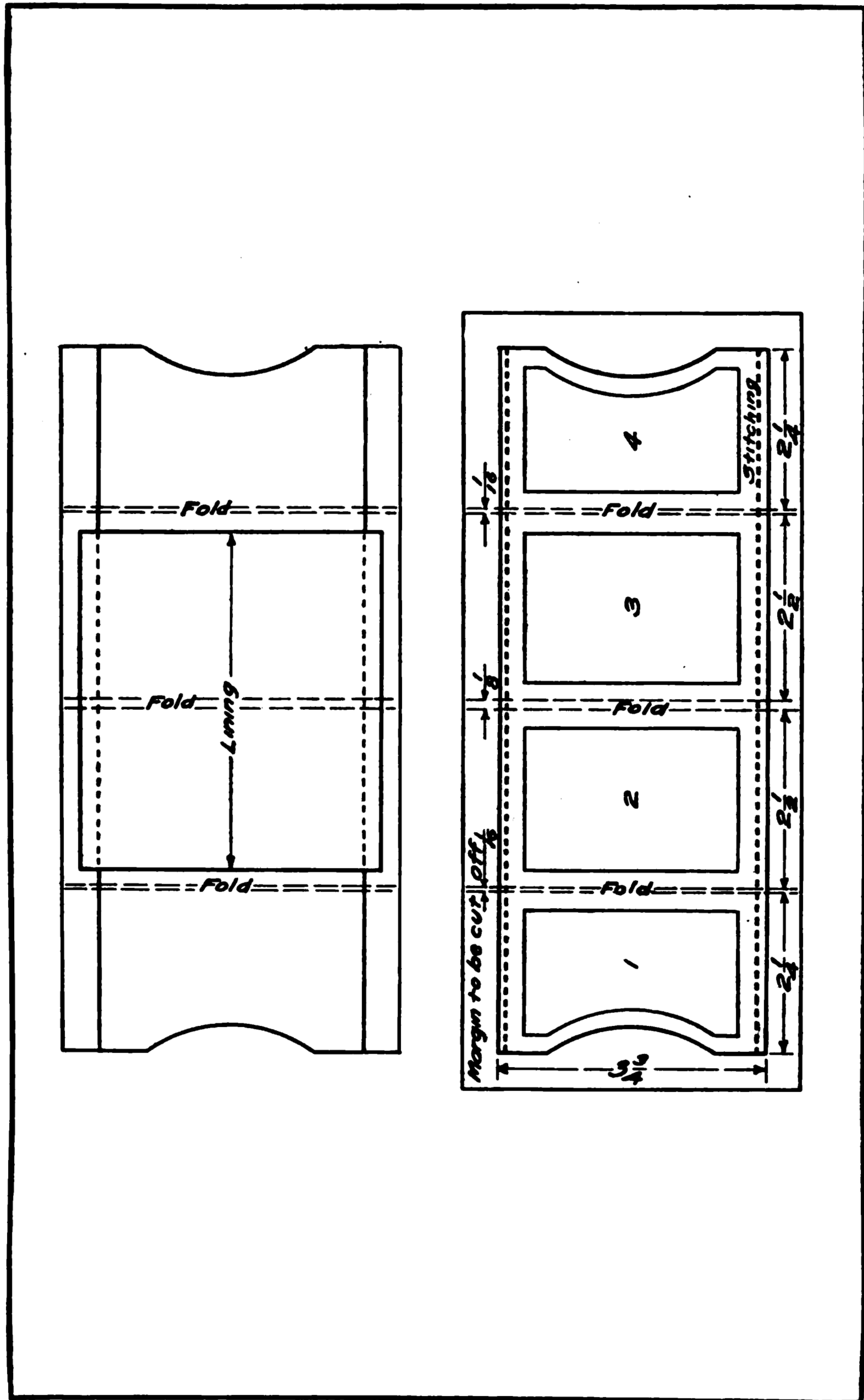


Fig. 19. Card-Case.



## VII. A CARD-CASE.

Consider first the size and proportions of the card-case. Take a piece of paper and fold it as shown in the drawing, Fig. 18, until you have the desired shape.

We will take the measurements as found on the working drawing, Fig. 19. The panels No. 2 and No. 3 are the outside panels and are separated by a space of  $\frac{1}{8}$ " which allows for the fold in the case. These panels are separated from the inside panels by  $\frac{1}{16}$ ". The inside panels form the pockets and should be  $\frac{1}{4}$ " narrower than the outside panels.

Lay out the working drawing very carefully using a T-square and triangle. When the working drawing is finished place the design for the front of the card-case on panel No. 3 and if a design or monogram is to be used on the back place it on panel No. 2. The line design on the inside should be placed on panels No. 1 and No. 4.

Make a tracing of the completed case on a piece of tracing paper that is at least  $\frac{1}{2}$ " larger all around than the design. Cut the leather as large as the pattern. Dampen the leather on the face, being careful to go over all of the surface. Place the tracing over the leather and fasten to the drawing-board with thumb-tacks placed on the margin of the design. Trace the design with the outlining tool using the rule for all straight lines. Be very careful not to draw the lines beyond where they should stop, and not to go over the lines more than once. Having completed the tracing, remove the tracing paper and proceed to go over all the lines making them strong and distinct. Do not use the rule for the straight lines except for the first tracing, for the lines would not have the same character that the other lines have. If the card-case is made of Russia calf it may now be treated

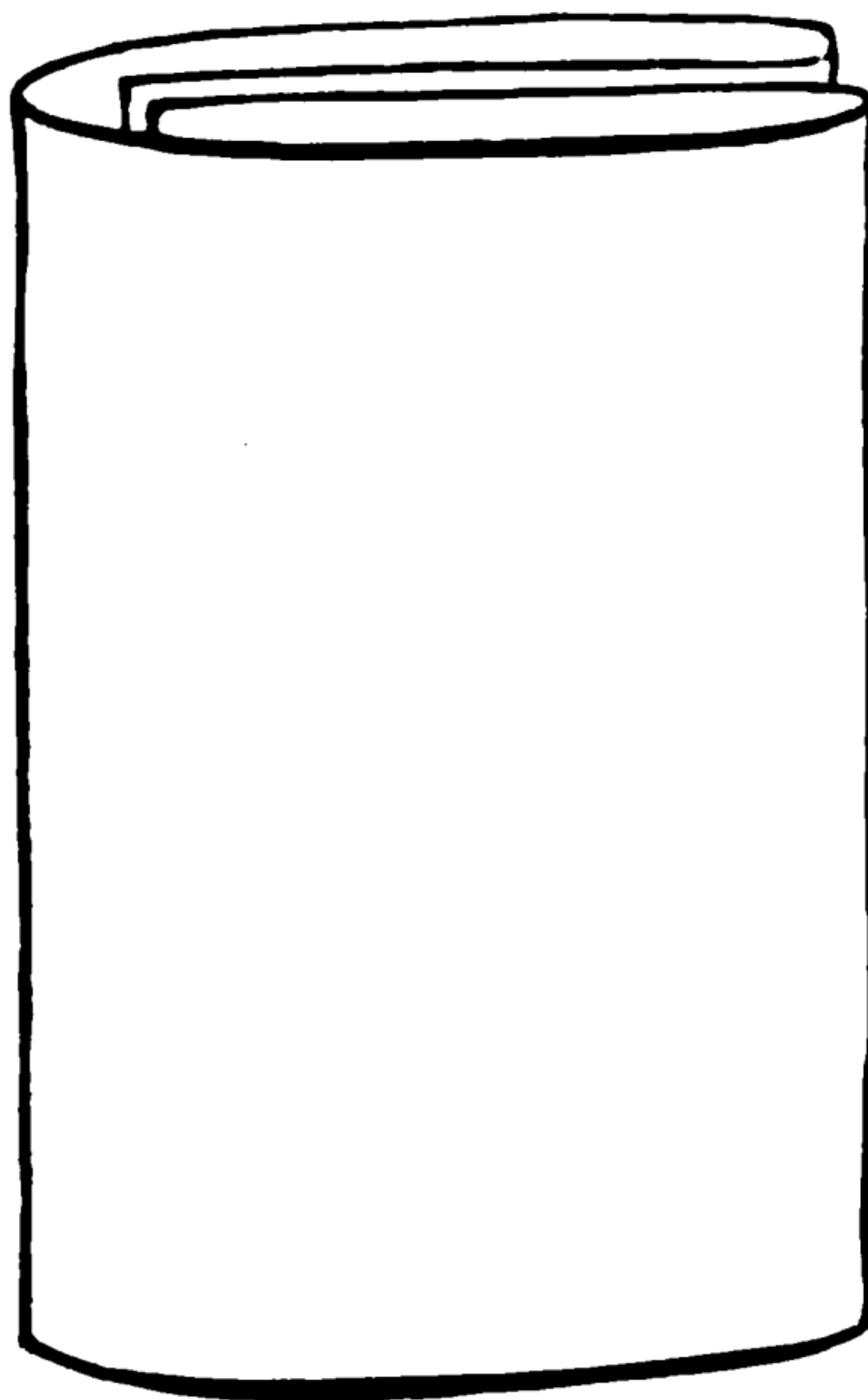


Fig. 18. Method of Folding Pattern.



in the manner described under "Flat Modeling," "Embossing," or "Carved." If the card-case is made of ooze sheep or suede and the design is traced upon the leather it is now ready to be stained.

When the leather has been decorated it is ready for the lining. With a sharp knife cut the outline of the flaps or pocket but leave

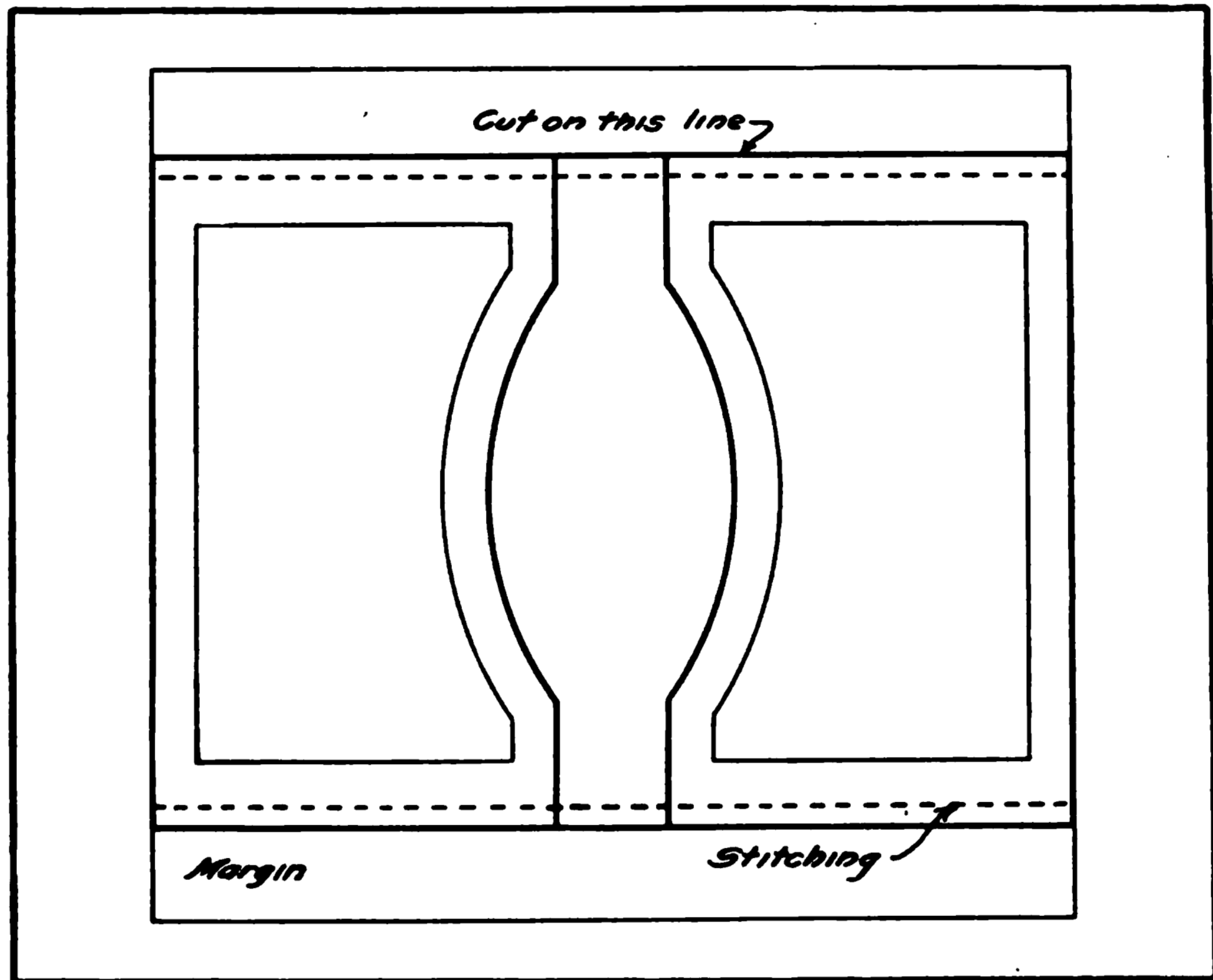


Fig. 20. Card-Case

the other edges uncut until after it has been sewed. Pare the leather where the folds come, so that it will make a neater fold. Moisten slightly at the fold. Bring the two ends together and place the middle fold on the edge of the table or board and hammer the edge with a broad headed hammer, using a dragging motion as you hammer. This will prevent any marks on the face of the leather. Fold the pockets in place and treat the fold in like manner.

Cut a piece of skiver leather, or soft ooze sheep, for the lining which is  $\frac{1}{4}$ " narrower than the two outside panels and a little deeper. See Fig. 19. Apply paste to the lining leather and place in position on the card-case and rub down thoroly. Place the card-case under a weight until dry. It is now ready to stitch.



The stitching should be on the line marked for it on the leather, and may be done on any sewing-machine using a long loose stitch. The silk thread should match the leather. After it is stitched the ends of the thread should be worked back for a few stitches and brought to the inside and cut off. Lay the card-case on the marble or glass and place a triangle or any straight edge  $\frac{1}{8}$ " from the sewing and cut on this line. See Fig. 20. Make a firm smooth cut clear thru the leather. The ends of the leather and the edge of the pockets are now stained with dye or water color paint to match the leather.

### VIII. A BILL-BOOK.

This bill-book, Fig. 21, should be made of Russia calf. The design should be placed upon the back and a monogram would be a suitable decoration for the outside flap above the fastener. The decoration may be in flat modeling, repoussé, or carved, and it may be colored if desired.

Make a full sized working drawing on tracing paper. This should contain the design for the front and back, also a line decoration around the flaps. Cut the leather  $\frac{1}{2}$ " larger all around than the working drawing. Dampen the face side of the leather and place tracing paper over it, and fasten to the drawing-board with thumb-tacks. Go over all the lines with the outlining tool; remove the paper and strengthen the lines; now proceed with the decoration in any of the previously suggested methods.

When the decoration is completed cut on the cutting lines. Cut the pockets from skiver or lining leather. One of the long sides of the large pocket is turned back about  $\frac{3}{8}$ " and basted. See Fig. 22. The small pockets are now placed in position on the large pocket and stitched along the edge that has been basted. These pockets are now placed in position on the inside of the cover and basted. See Fig. 21. It is now stitched with silk to match the leather and the fasteners are put on as shown in drawings.



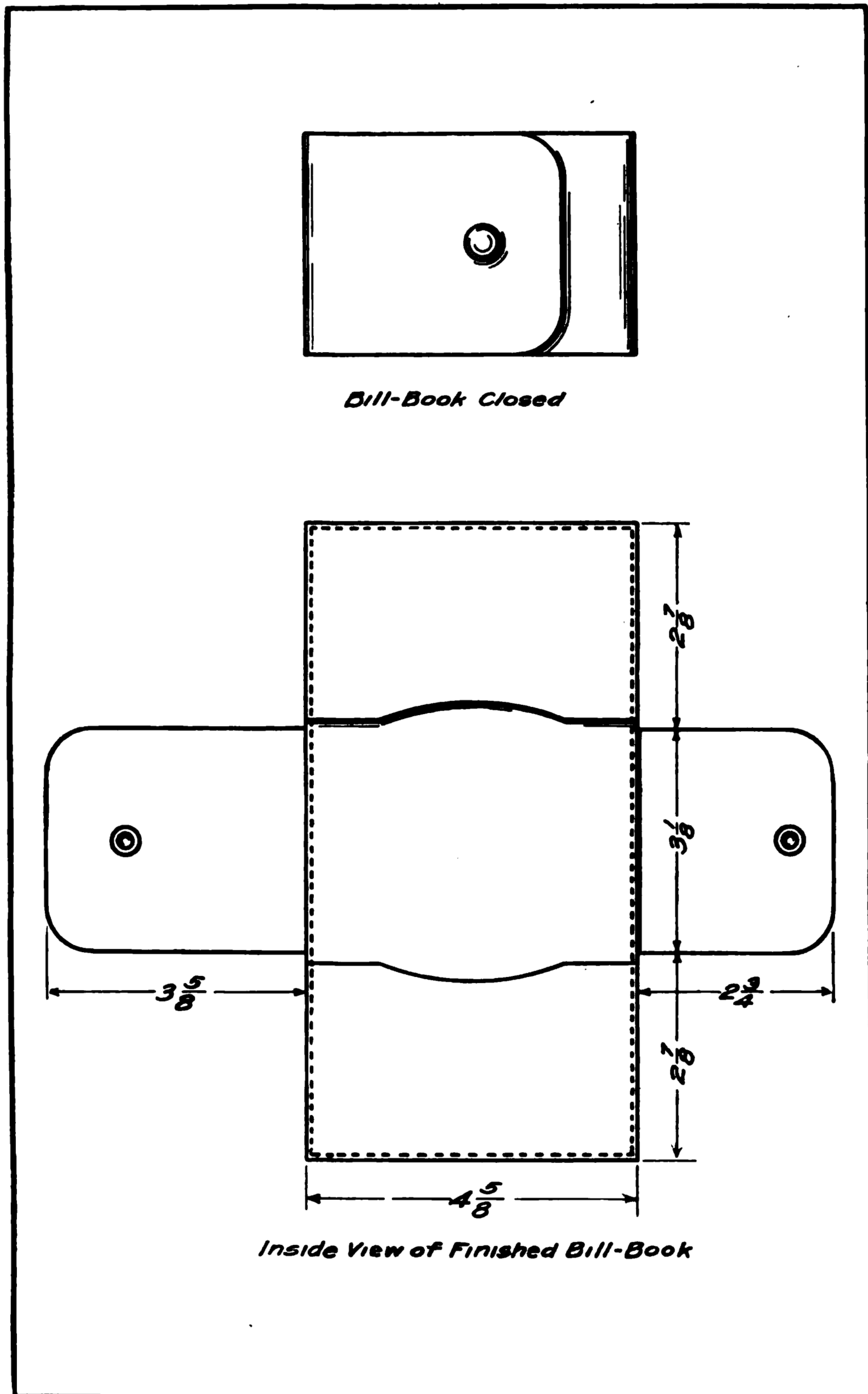


Fig. 21. Bill-Book.



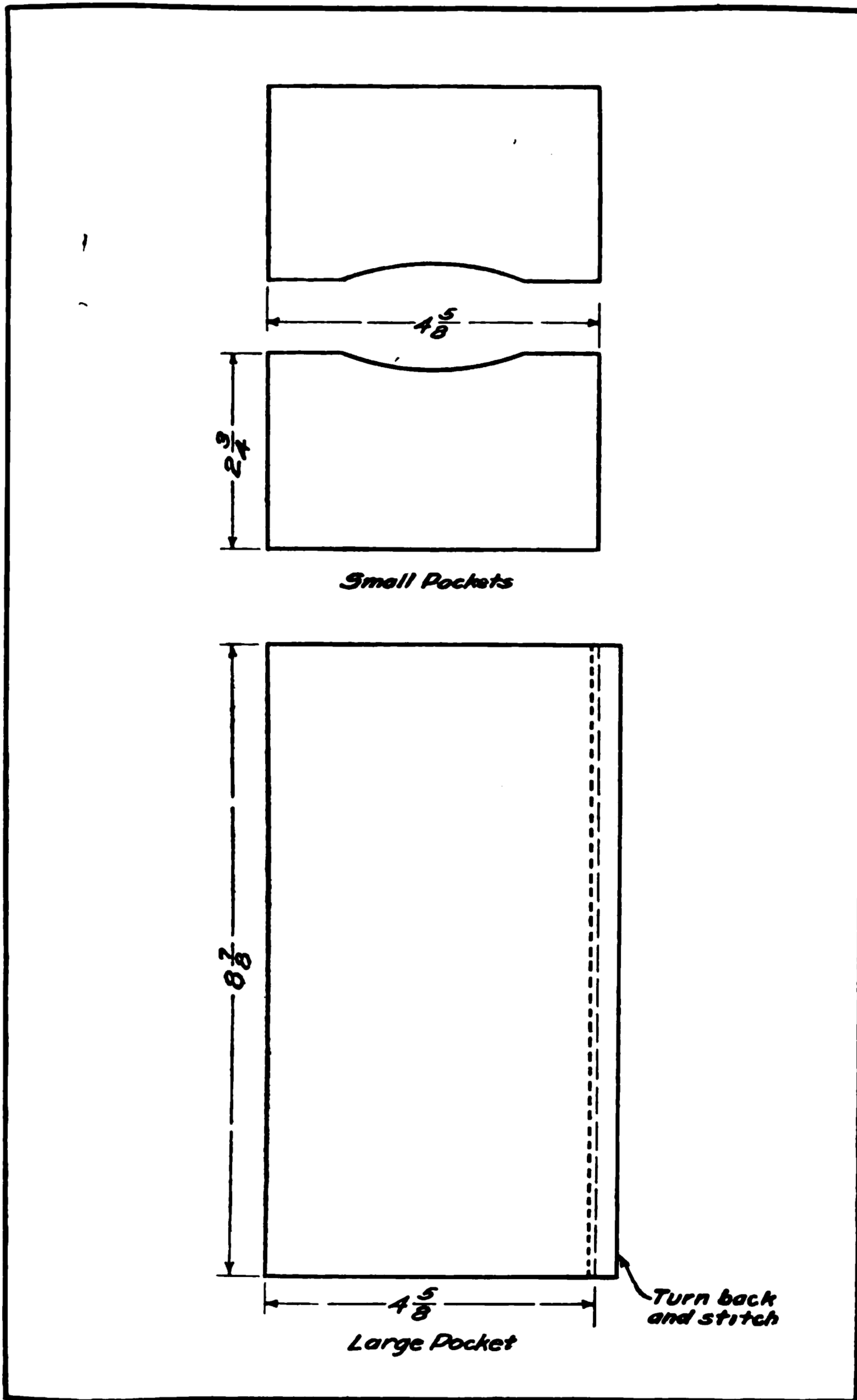


Fig. 22. Details of Bill-Book.



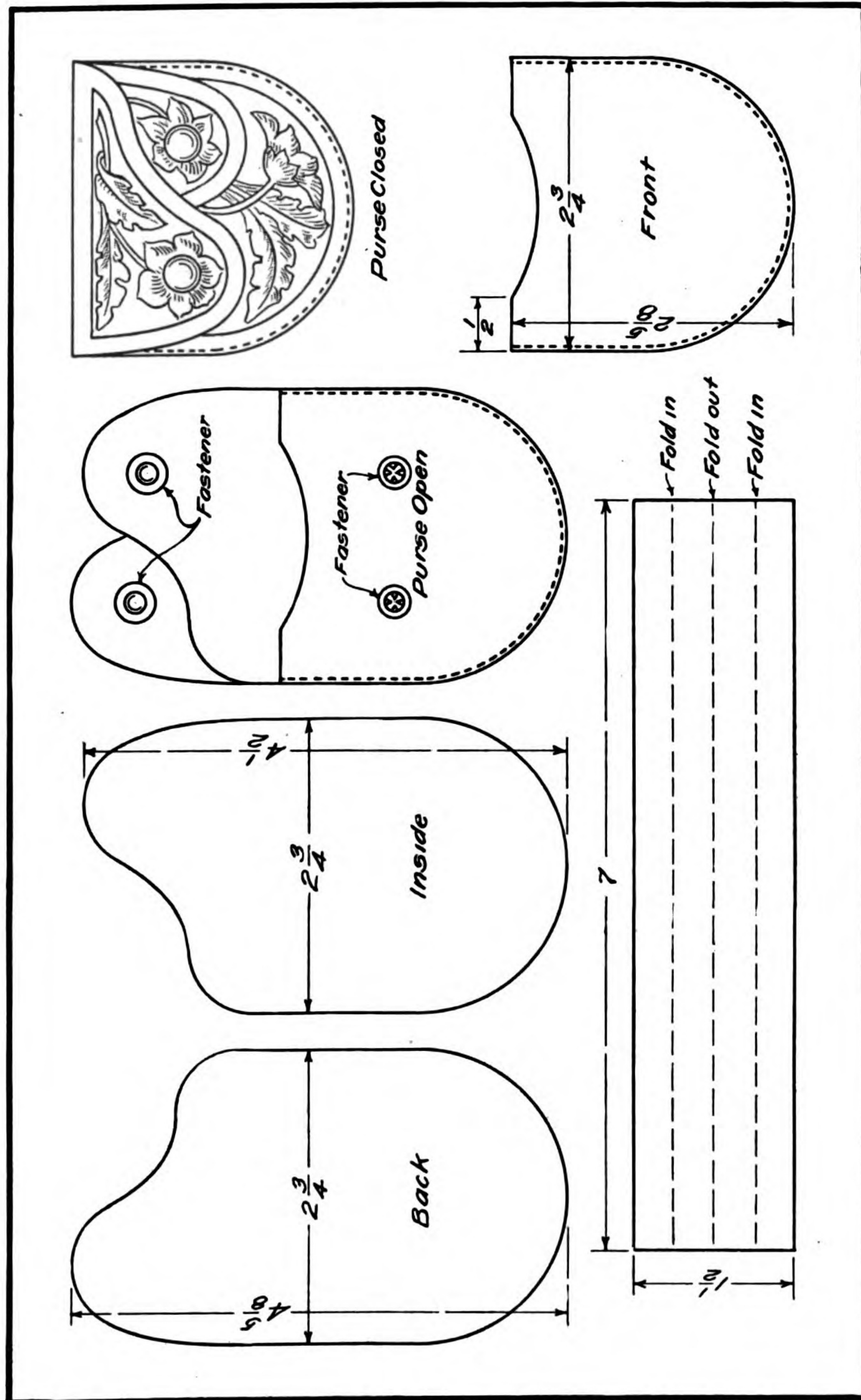


Fig. 23. Coin-Purse.



## IX. A COIN-PURSE.

This handy little coin-purse, Fig. 23, is made of Russia calf and may be decorated in either repoussé or carved. First make a full sized working drawing on tracing paper. This should contain the design intended for the back, front, and flap of the inside section. Cut the leather  $\frac{1}{2}$ " larger around than the various parts of the purse. Dampen the finished surface of the leather with a sponge. Place the tracing paper over the leather and fasten to a drawing-board with thumb-tacks. Trace all the lines of the drawing. Remove the paper and go over all the lines again with the outlining tool. Proceed to finish the decoration in either modeling or carving. When the decoration is finished cut the leather on the outside or cutting lines. Put the fasteners on, being careful to have them in their right positions.

Cut the long strip of leather, that forms the side of the purse, from skiver and fold as indicated in Fig. 24, *a*. Dampen and put under weight. Take this piece of leather and where it is marked "fold out" place it around the lower edge of the inside piece of the purse and stitch in position. The stitching should be about  $\frac{1}{8}$ " from the edge of the fold. See Fig. 24, *a*, *b*. One of the edges of this piece is stitched to the lower part of the inner side of the back of the purse, and the other edge is stitched to the lower part of the inner side of the front piece of the purse. See Fig. 24, *a*, *b*. To finish the purse, dampen the edges slightly and polish by rubbing with the flat modeling tool.

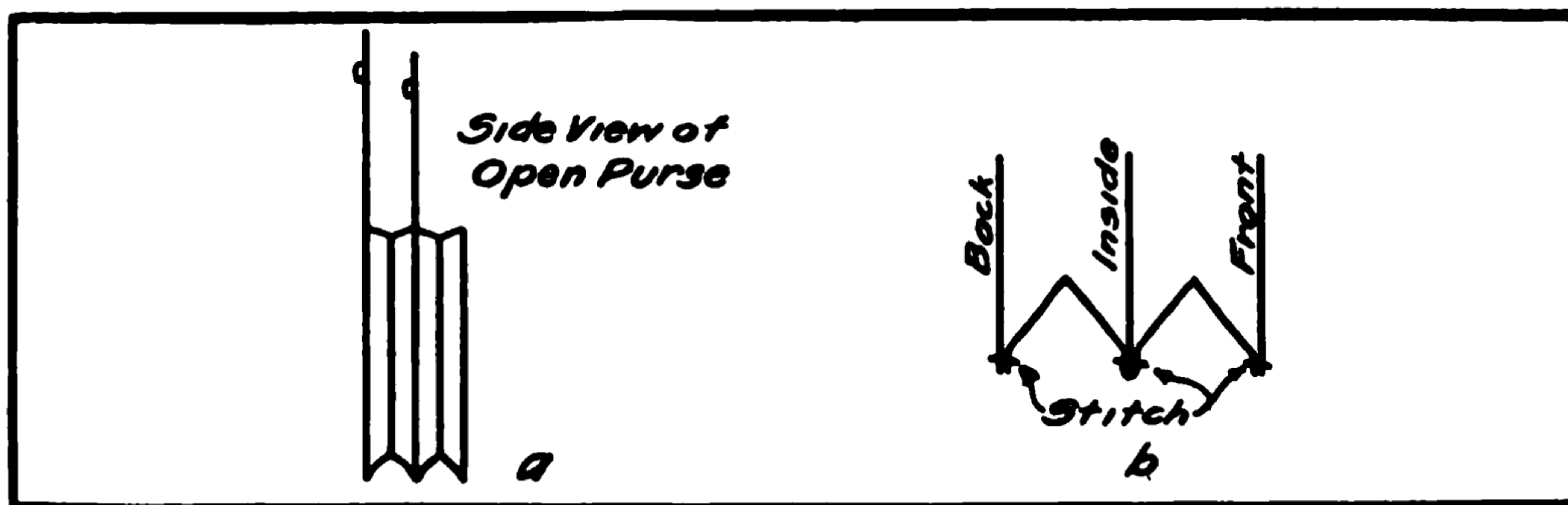


Fig. 24. Details of Coin-Purse.



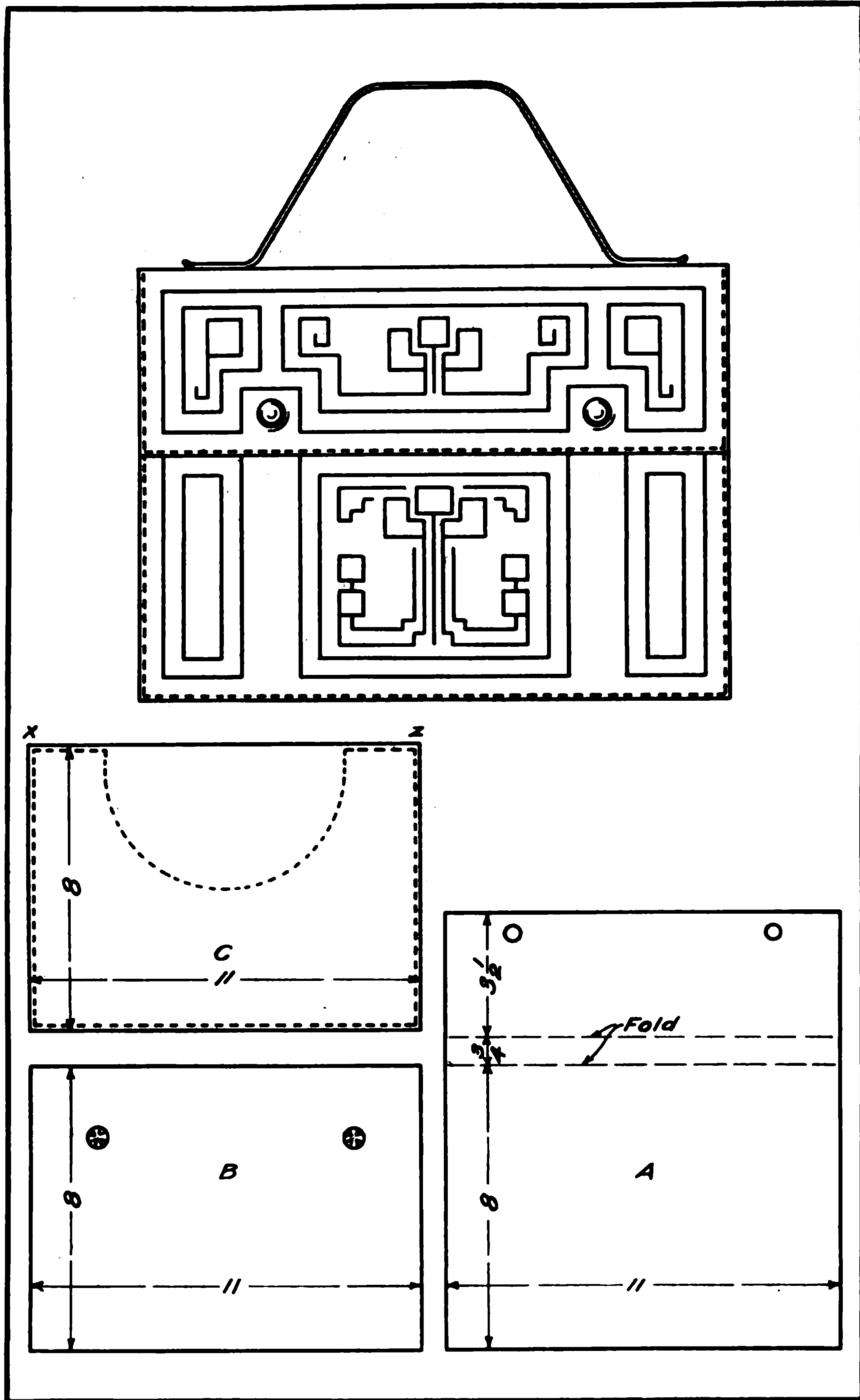


Fig. 25. Flat Modeled Hand-Bag.



## X. FLAT MODELED HAND-BAG.

Cut from Russia calfskin two pieces of leather, Fig. 25, one of the dimensions of *A* and one of the dimensions of *B*, allowing  $\frac{1}{2}$ " on all sides of each piece for thumb-tacks. Apply the design and model according to the directions given under "Flat Modeling." Cut from skiver or lining leather two pieces like *C* (placing the finished sides together) and stitch the upper portions together from *x* to *z*. Cut a piece of lining like *A* and one like *B*. Make handle by cutting one strip of leather as long as desired handle and twice as wide as desired when finished. Turn the two outside edges to center of strip and stitch twice down the center. The handles may now be stitched in place between the two folds marked on *A*, or they may be riveted in place with copper rivets.

Next put the fasteners on the decorated pieces as indicated in *A* and *B*, and cut the edges of *A* and *B* on the cutting line. Baste the lining on *A* and *B*, and place the two pieces of *C* between *A* and *B* to form two pockets. Baste into position and sew *B* to *C* and *A* to *C*. Stain the cut edges to match the color of the outside leather. This completes this very useful hand-bag.



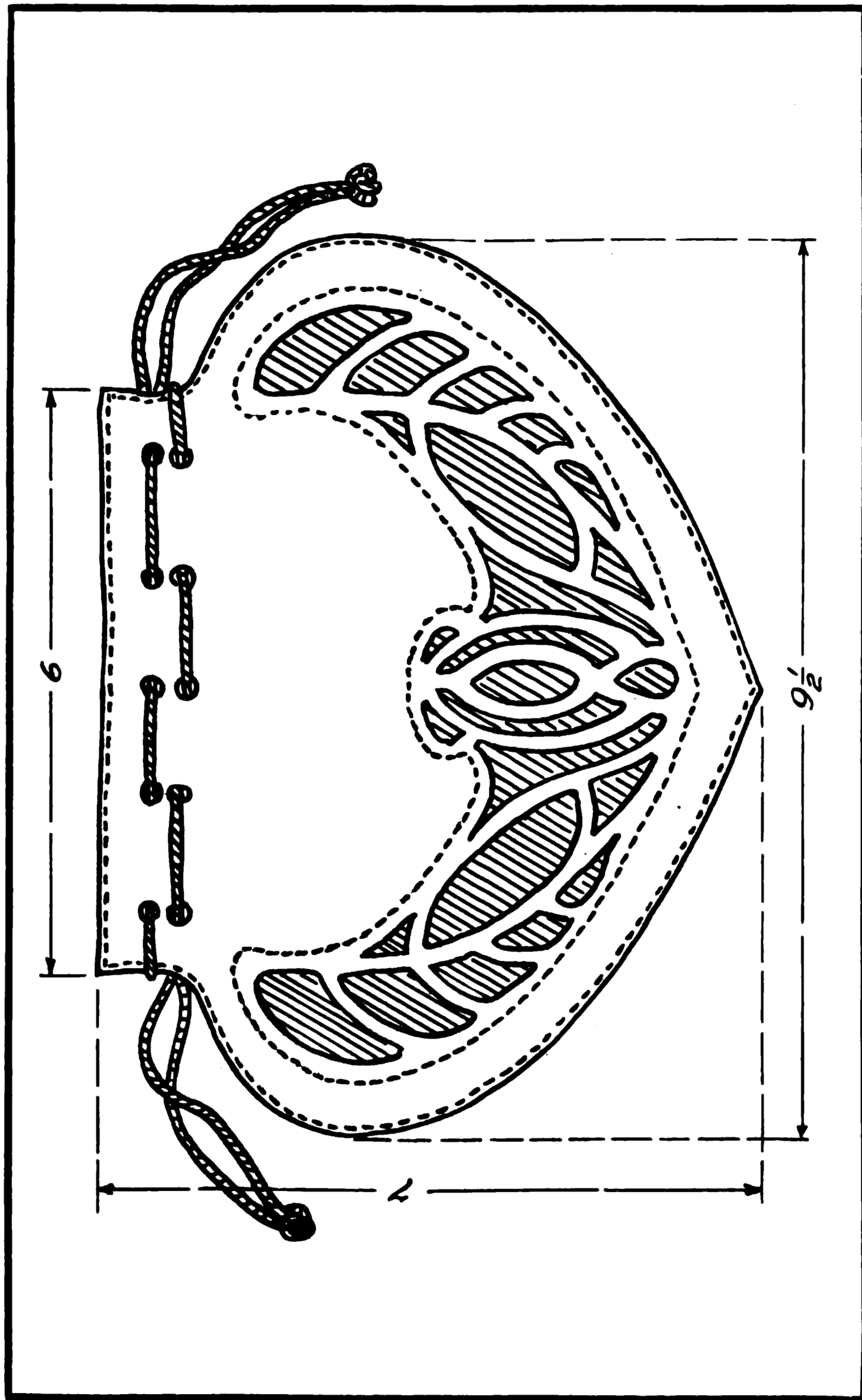


Fig. 26. Ooze Leather Opera-Bag.



## XI. OPERA-BAG OF CUT-WORK.

Cut from ooze ox, calf, or sheepskin two pieces of leather  $\frac{1}{2}$ " larger on all sides than the bag is to be when finished. See Fig. 26. Place design on the bag and proceed as in directions given for "Cut-work." When the design has been cut out, place behind the open places velvet, satin, or contrasting leather, and paste as directed. Now sew the leather to the background close to the edge of the design; see Fig. 26. Cut from any desired lining material two pieces the shape of the outside leather, allowing for seams. Stitch the lining together, leaving the top open a little beyond where the holes are to be made in the bag for the drawing cord. Stitch the bag together as far as the holes for the drawing cord; then place the lining inside of the bag and turn the lining in at the top and down the sides until it meets the stitching of the bag. Put a small amount of paste over the portion where the holes are to be made. Baste in position and stitch front and back of top of bag separately. Punch holes in the bag as indicated in the drawing, and lace with cord to match the leather or color under the cut-work.



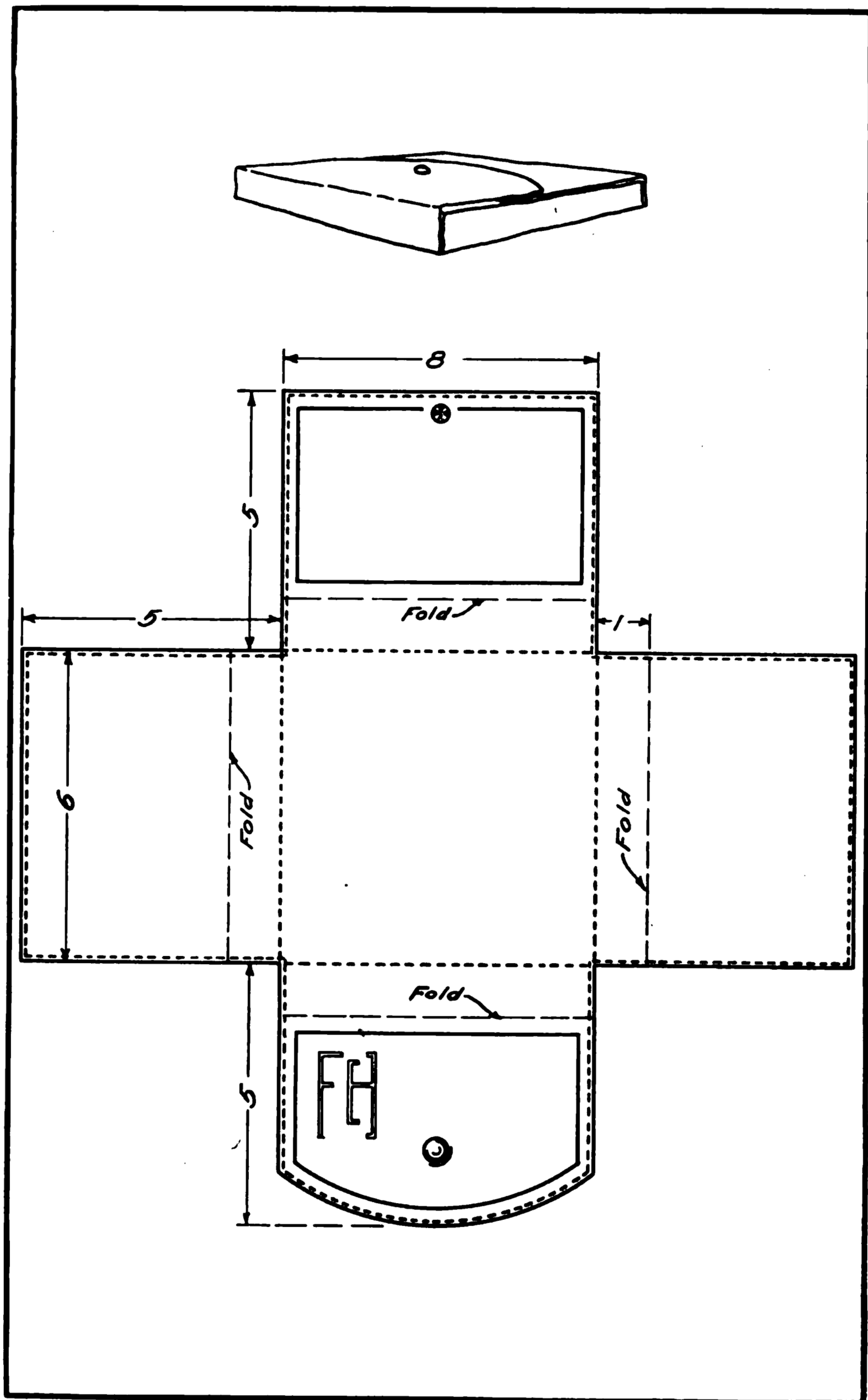


Fig. 27. Gentleman's Handkerchief-Case.



## XII. GENTLEMAN'S HANDKERCHIEF-CASE.

This handkerchief-case, Fig. 27, could be very appropriately decorated on the upper flap, with a monogram. This should be tooled and may be stained if desired. Cut from Russia calfskin a piece  $\frac{1}{2}$ " larger all around than the dimensions given. Tool the design according to the directions given for "Tooled Leather." Then cut to the required size for the case. Fold on line indicating a fold. Dampen on the line and lightly tap the fold with a broad hammer. Cut a piece of linen canvas or stiff paper the size of the bottom of the case and extending on the sides up to the top fold. Paste this on the Russia calfskin with library paste or thin glue and rub down thoroly.

Cut a piece of lining leather or silk the size of the outside and baste to the outside piece. Stitch all around, also on the fold on the bottom. Trim edges and put on fastener. Stain the edge to match the leather.

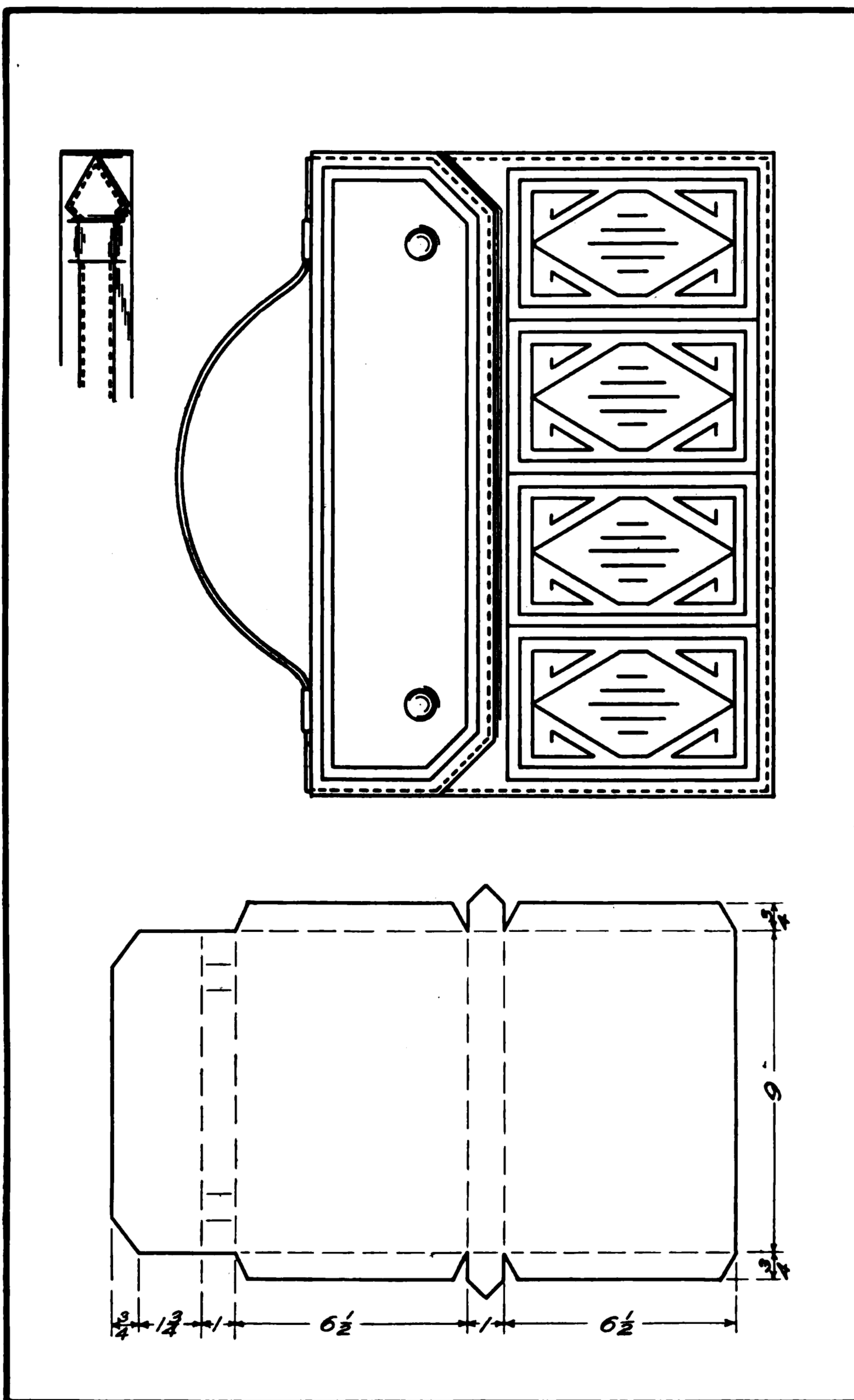


Fig. 28. One-Piece Hand-Bag.



### XIII. ONE-PIECE HAND-BAG.

Make a careful drawing of the bag using the T-square and triangle. See Fig. 28. Place the design on this paper, and make a tracing of the whole on tracing paper or tracing cloth. Place this tracing over the leather, which should be  $\frac{1}{2}$ " larger all around than the drawing. Proceed to tool the leather according to the directions given for "Flat Modeling" or "Repoussé." When the tooling has been finished, cut the leather with a sharp knife on the cutting line using a straight edge to guide the knife. Dampen the leather on the back along the line of the folds, and fold into position. Strike the folded edge lightly with a broad headed hammer, or press with a bone folder or dull paper knife, first laying a paper over the leather to prevent marking it. Put the fasteners on before sewing the ends. The seams at the ends are then sewed. See methods for sewing.

Let the edges overlap each other  $\frac{1}{4}$ ", and sew flat. The small pointed flap is put in position letting it come on the inside of the bag. Now stitch in position. The handle consists of two pieces of leather glued and stitched together and should be cut after it is sewed, in the shape of an arrow on the end, see drawing. The handle is pushed thru the slits that are at each end of the top of the bag, see drawing. The part between the slits is sewed to the handle. When a large bag is made, it is best to stitch and glue a heavy piece of leather under the portion where the handle is sewed. If the bag is to be lined this should be done before the lining is put in. The fasteners should match the leather, or if the design is colored they could match the color of the decoration. All edges should be stained to match the leather.



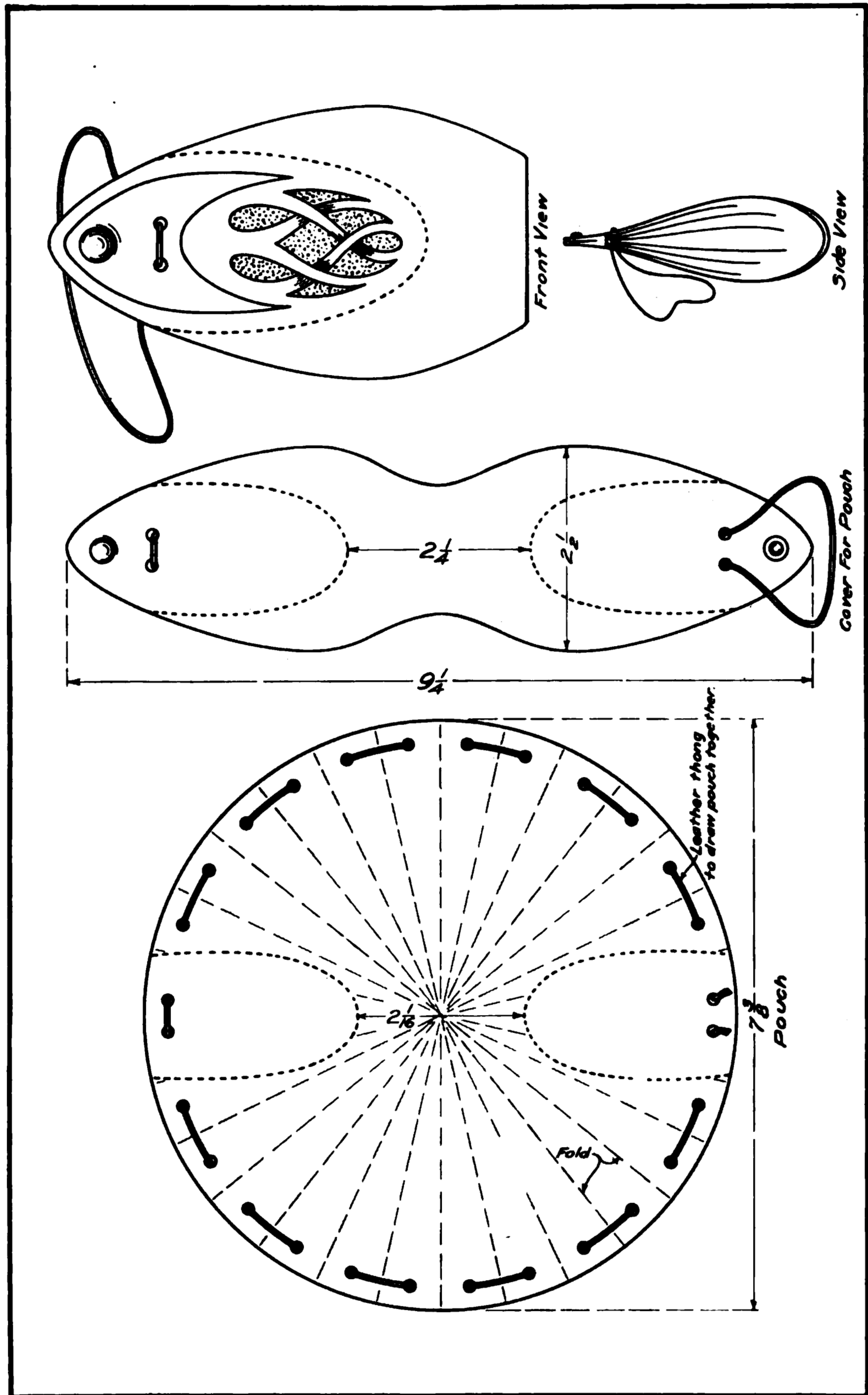


Fig. 29. Money-Pouch.



#### XIV. TO SEW LEATHER.

There are three ways to sew leather :

(1) Use a running stitch to join the seam, returning in the same holes but going over where the threads went under. This gives a continuous stitch on both sides of the seam, and if evenly done has the effect of machine sewing.

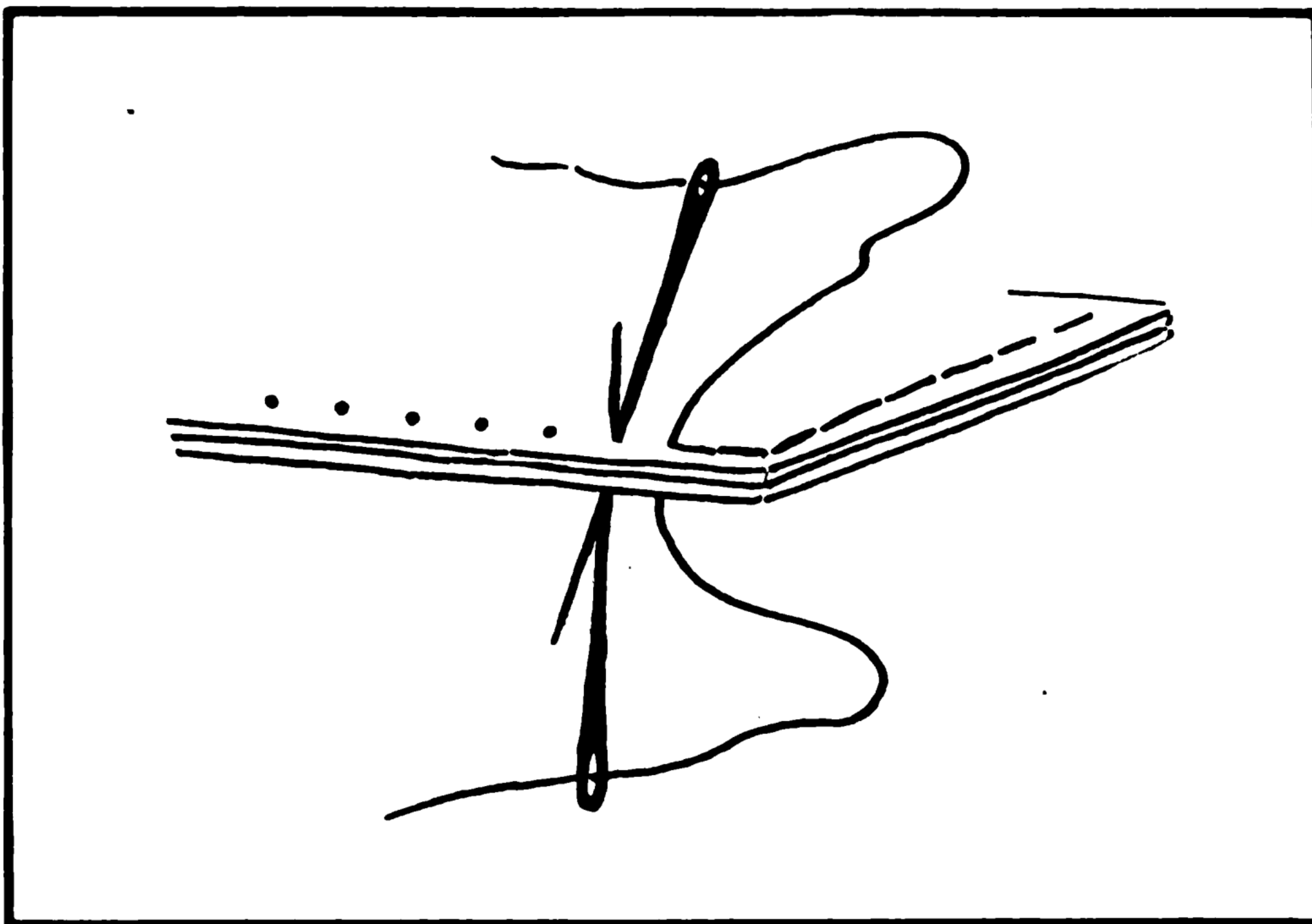


Fig. 30. Sewing with Two-Threads. Cobbler's Stitch.

(2) The cobbler's stitch. Two threads are required for this stitch. The needles go thru the same holes but in opposite directions. See Fig. 30.

(3) Leather may be stitched on a sewing-machine, using a long loose stitch. Place a thin paper between the leather and the feed of the machine when stitching. This is to protect the leather from marks. The paper is easily removed when the stitching is completed.

## XV. PROBLEMS FOR THE GRADES.

### Fifth Grade.

- Pen-wiper, colored design. Material, ooze ox or sheep.
  - Stamp-book, colored design. Material, ooze ox or sheep.
  - Scissors-case, colored design. Material, ooze ox or sheep.
- The designs may be painted or stenciled with water colors or dye

### Sixth Grade.

- Pen-wiper, flat modeling. Material, Russia calf.
- Blotter-cover, flat modeling. Material, Russia calf.
- Small coin-purse, flat modeling. Material, Russia calf.
- Small coin-purse, colored design. Material, ooze ox.

### Seventh Grade.

- Card-case, colored design. Material, ooze ox or sheep.
- Simple bill-book, flat modeling. Material, Russia calf.
- Baggage-tag, flat modeling. Material, Russia calf.
- Scissors-case, flat modeling. Material, Russia calf.
- Address-book, colored design. Material, ooze ox or sheep.

### Eighth Grade.

- Card-case, repoussé modeling. Material, Russia calf.
- Memorandum-pad, repoussé modeling. Material, Russia calf.
- Belt-pad, repoussé modeling. Material, Russia calf.
- Coin-purse, two pockets, repoussé modeling. Material, Russia calf.
- Bag with silk top, colored design. Material, ooze ox.
- Simple cut-work bag. Material, ooze ox or sheep.



## XVI. PROBLEMS FOR THE HIGH SCHOOL.

Hand-bags, repoussé modeling, plain or colored. Material, Russia calf.

Bill-books, repoussé modeling, plain or colored. Material, Russia calf.

Desk-sets, repoussé modeling, plain or colored. Material, Russia calf.

Handkerchief-case, repoussé modeling, plain or colored. Material, Russia calf.

Money-pouch, repoussé modeling, plain or colored. Material, Russia calf.

Magazine-cover, repoussé modeling, plain or colored. Material, Russia calf.

Two-section purse, carved leather. Material, calf-skin.

Belt, carved leather. Material, calfskin.

Pen-wiper, carved leather. Material calfskin.

Needle-book, carved leather. Material, calfskin.

Opera-bags, cut-leather. Material, ooze sheep.

Fancy bags, stained design. Material, ooze ox.

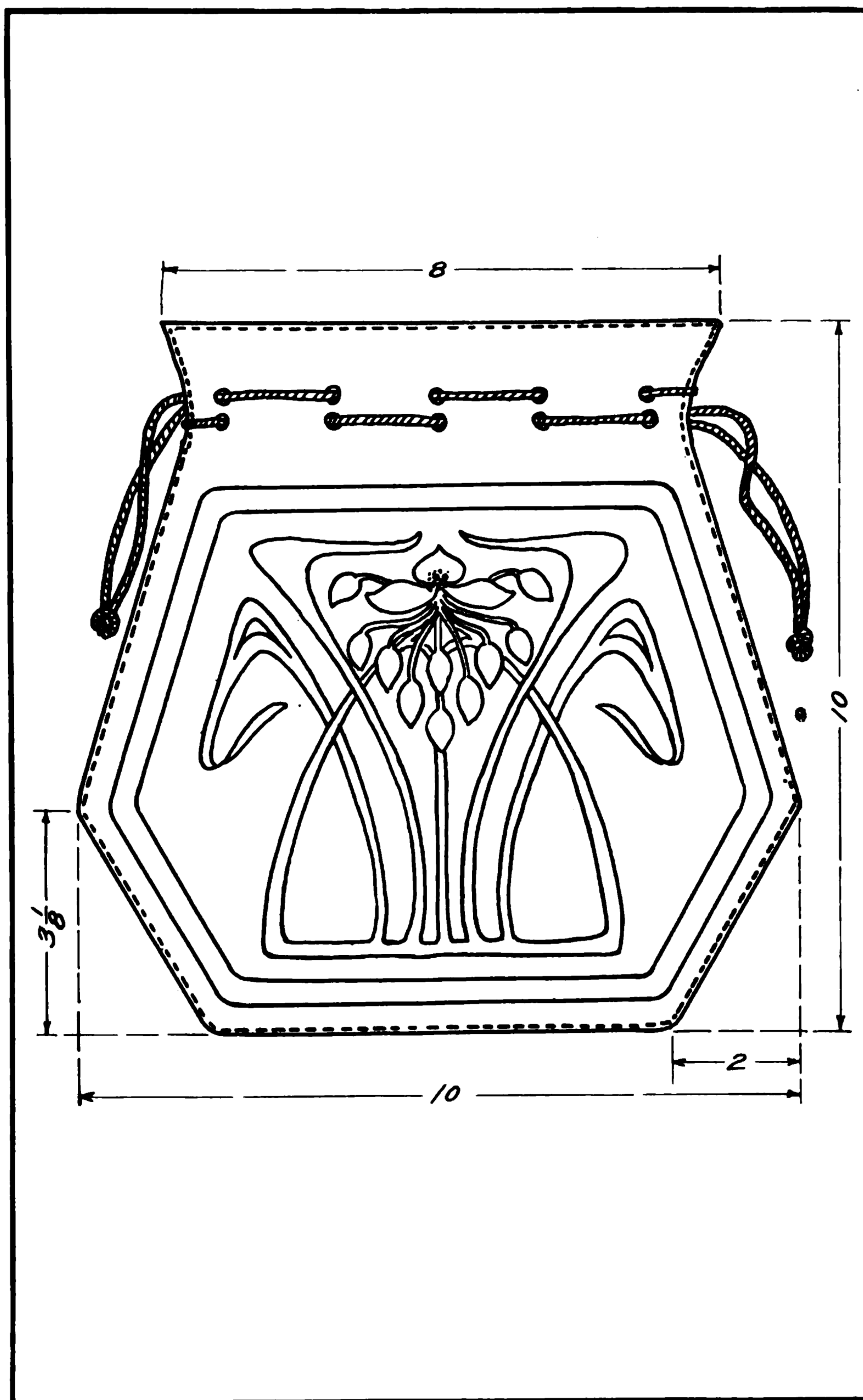


Fig. 31. Fancy Bag with Stained Design.



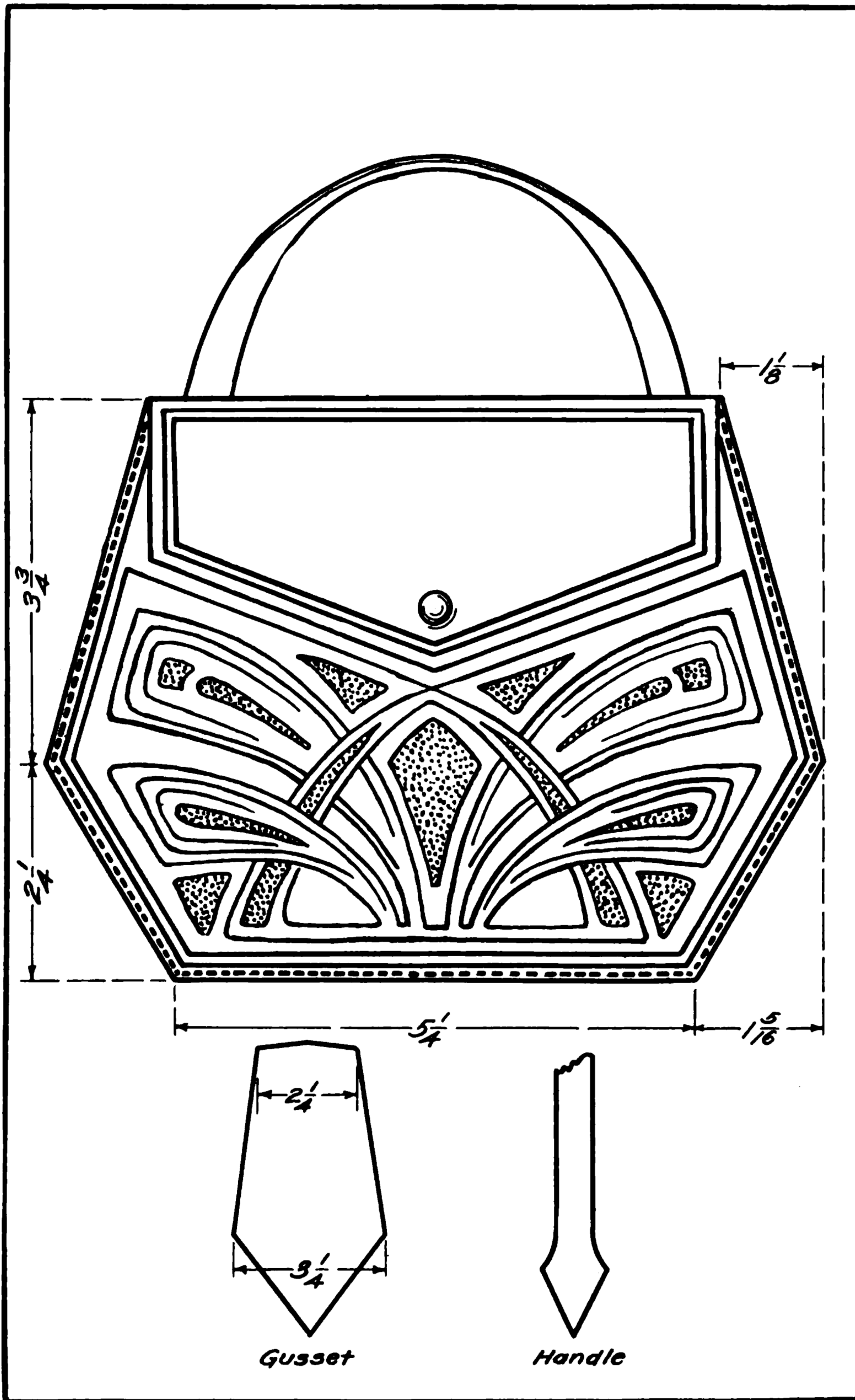


Fig. 32. Hand-Bag.

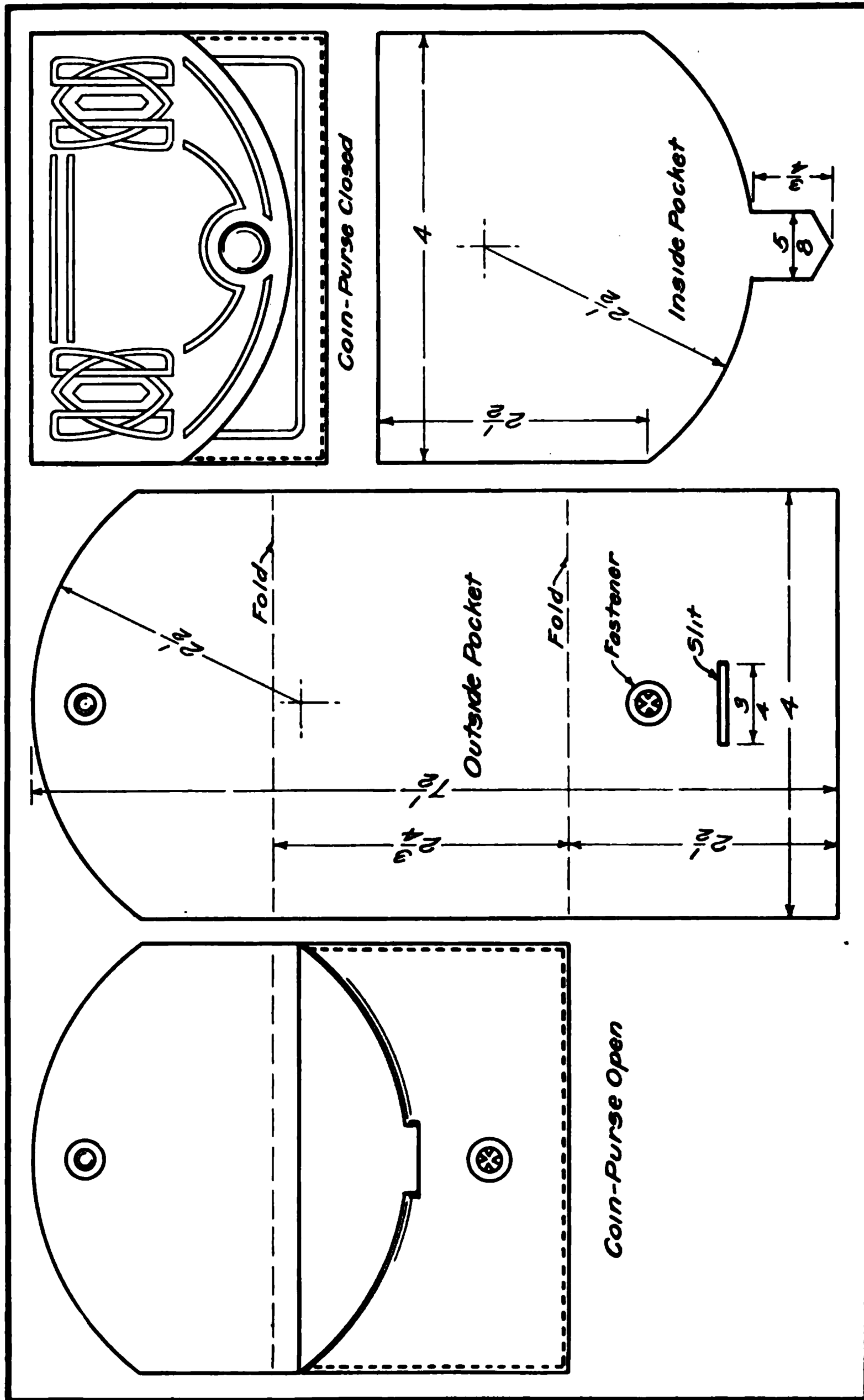


Fig. 33. Coin-Purse with Two Pockets.



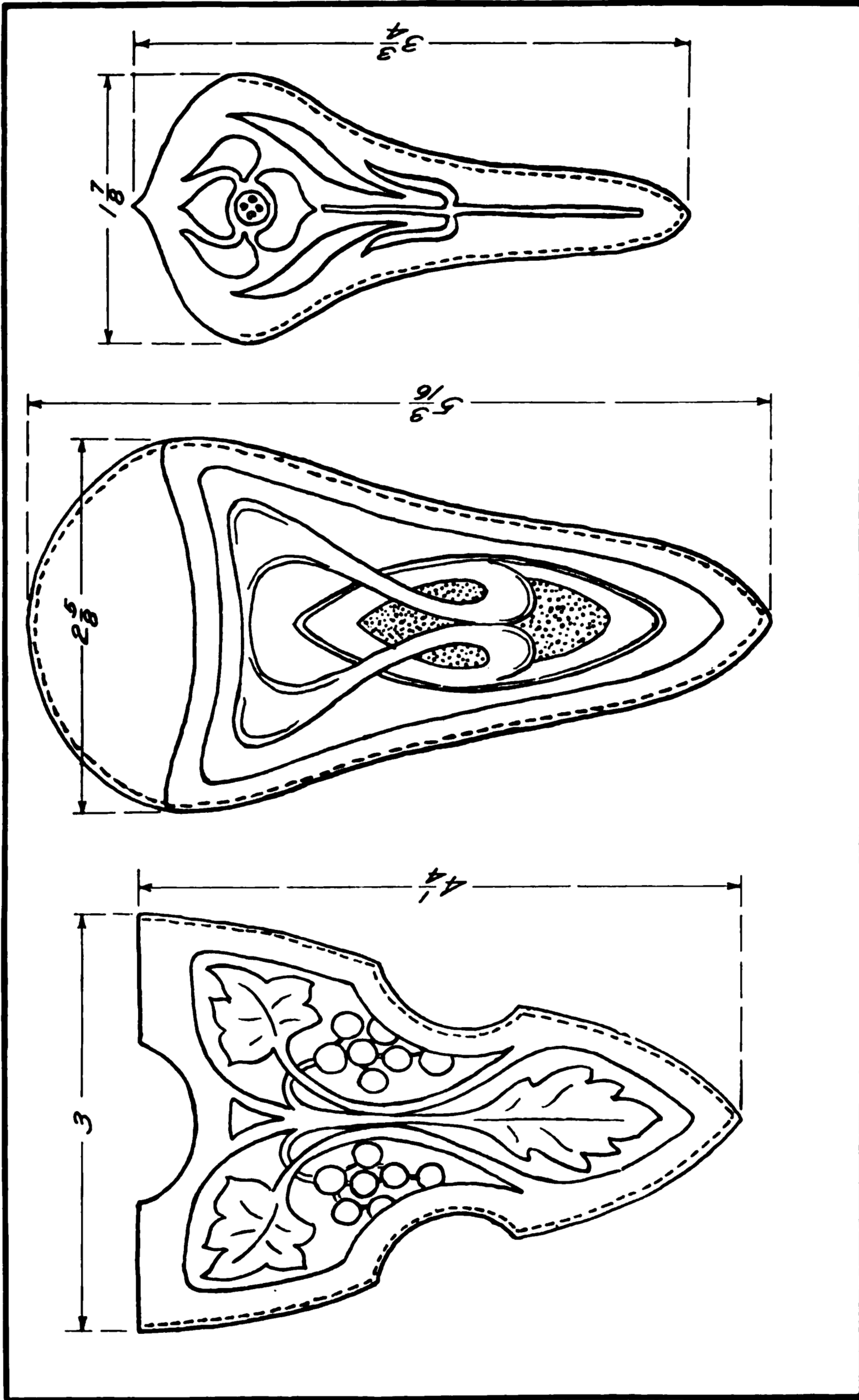


Fig. 34. Scissors-Cases.

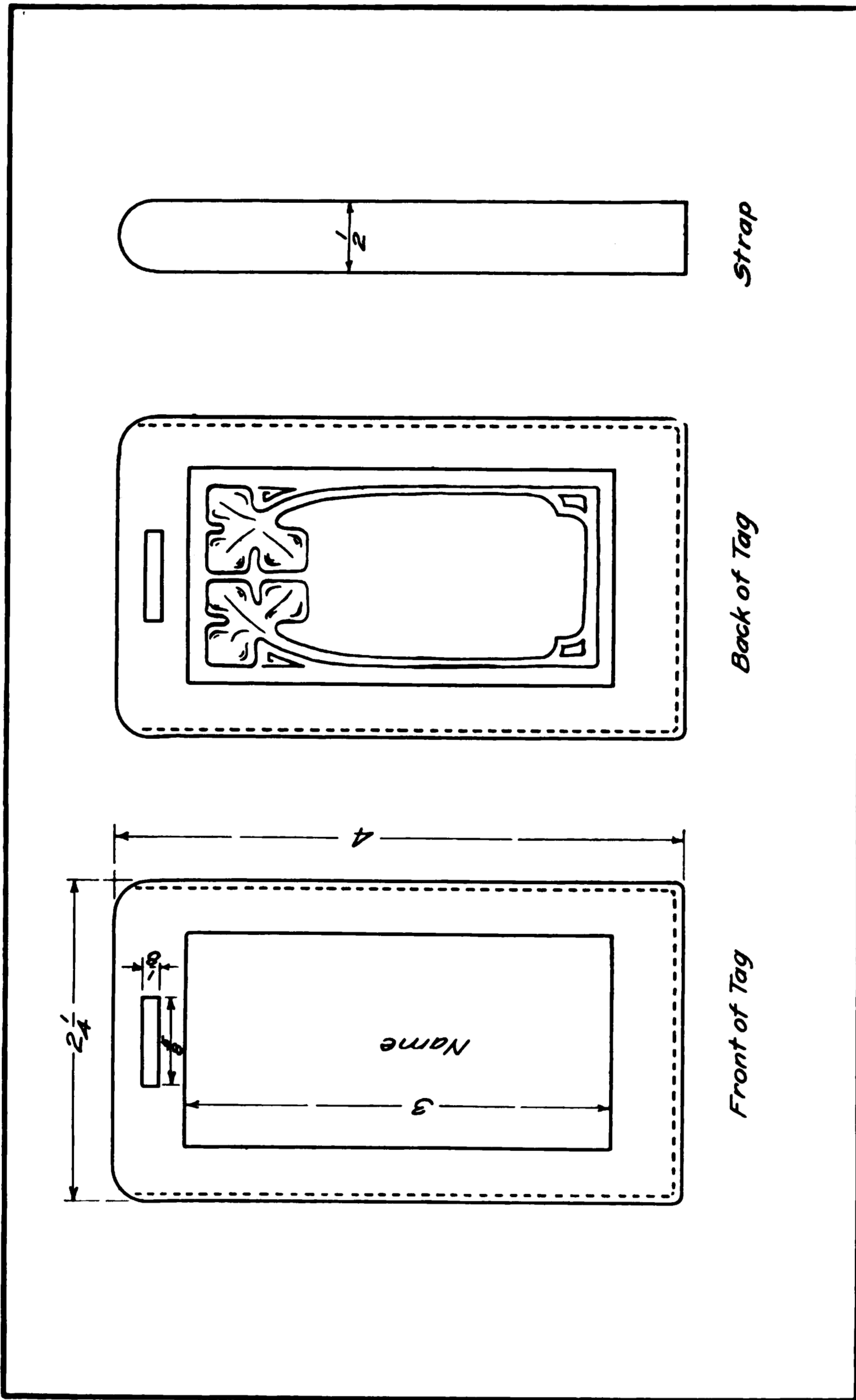


Fig. 35. Baggage-Tag.



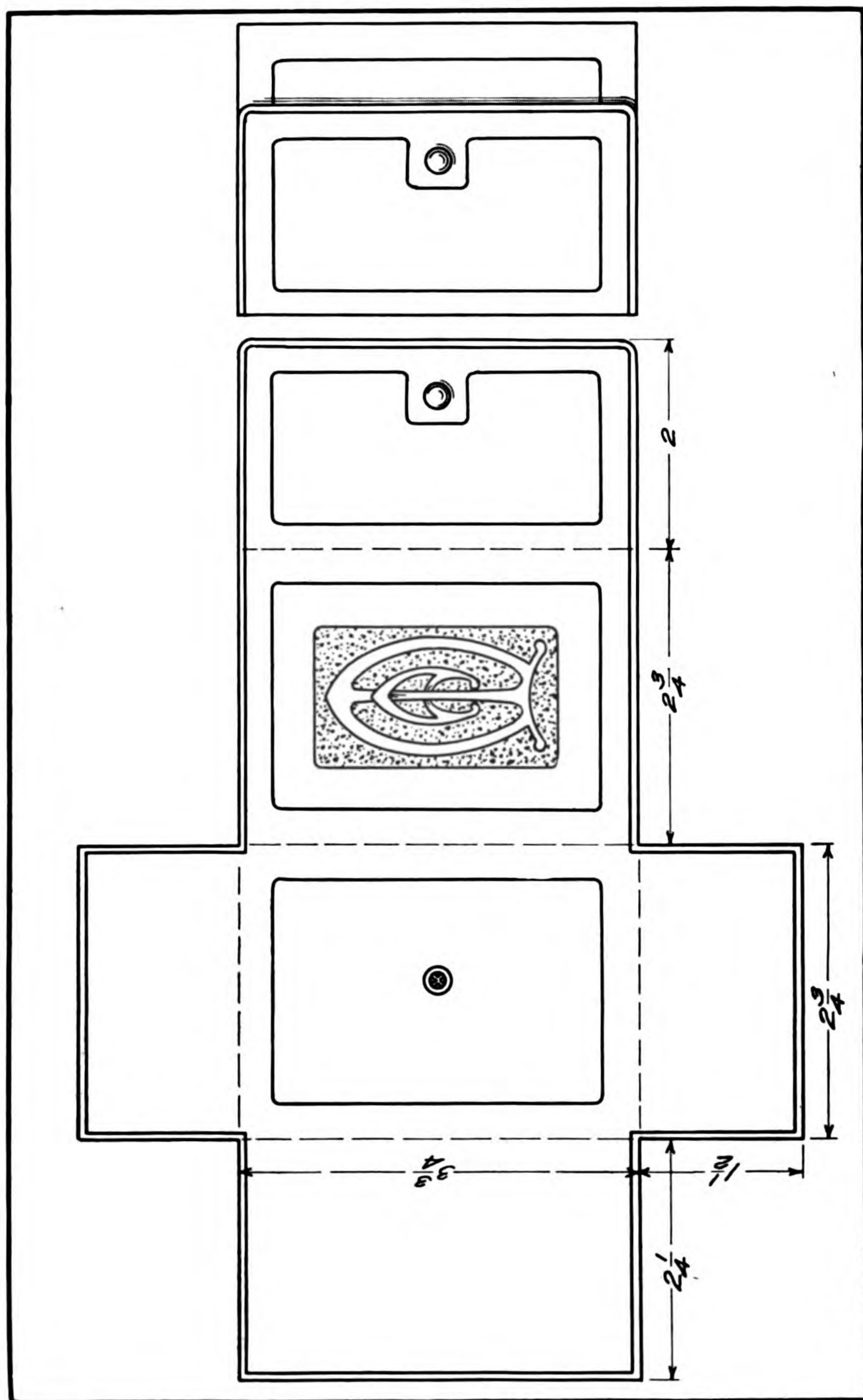
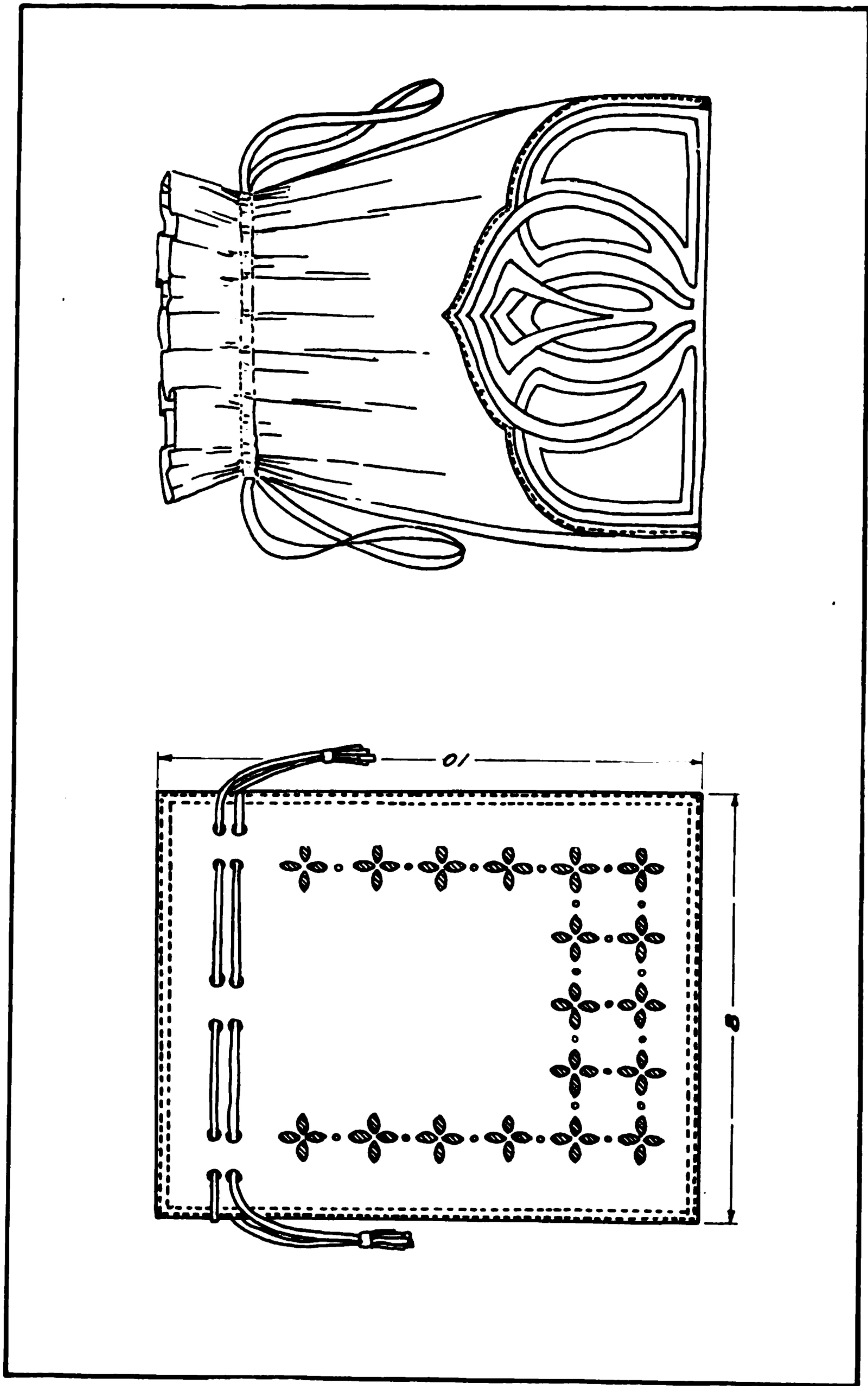


Fig 36. Russia Calfskin Bill-Fold—Open and Closed.



Bag of Silk and Tooled Leather.

Fig. 37. Cut-Work Bag.



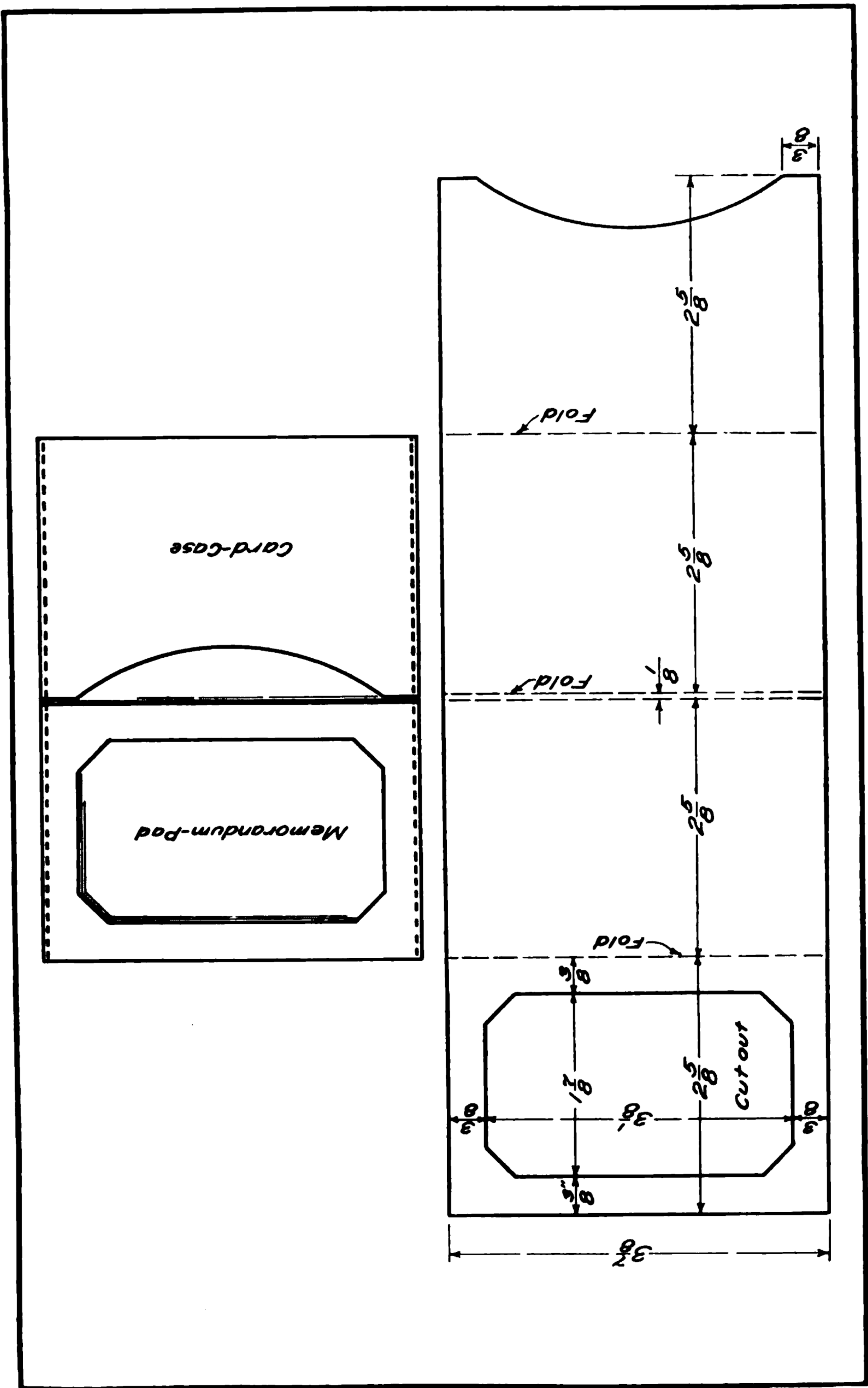


Fig. 38. Folding Memorandum-Pad.

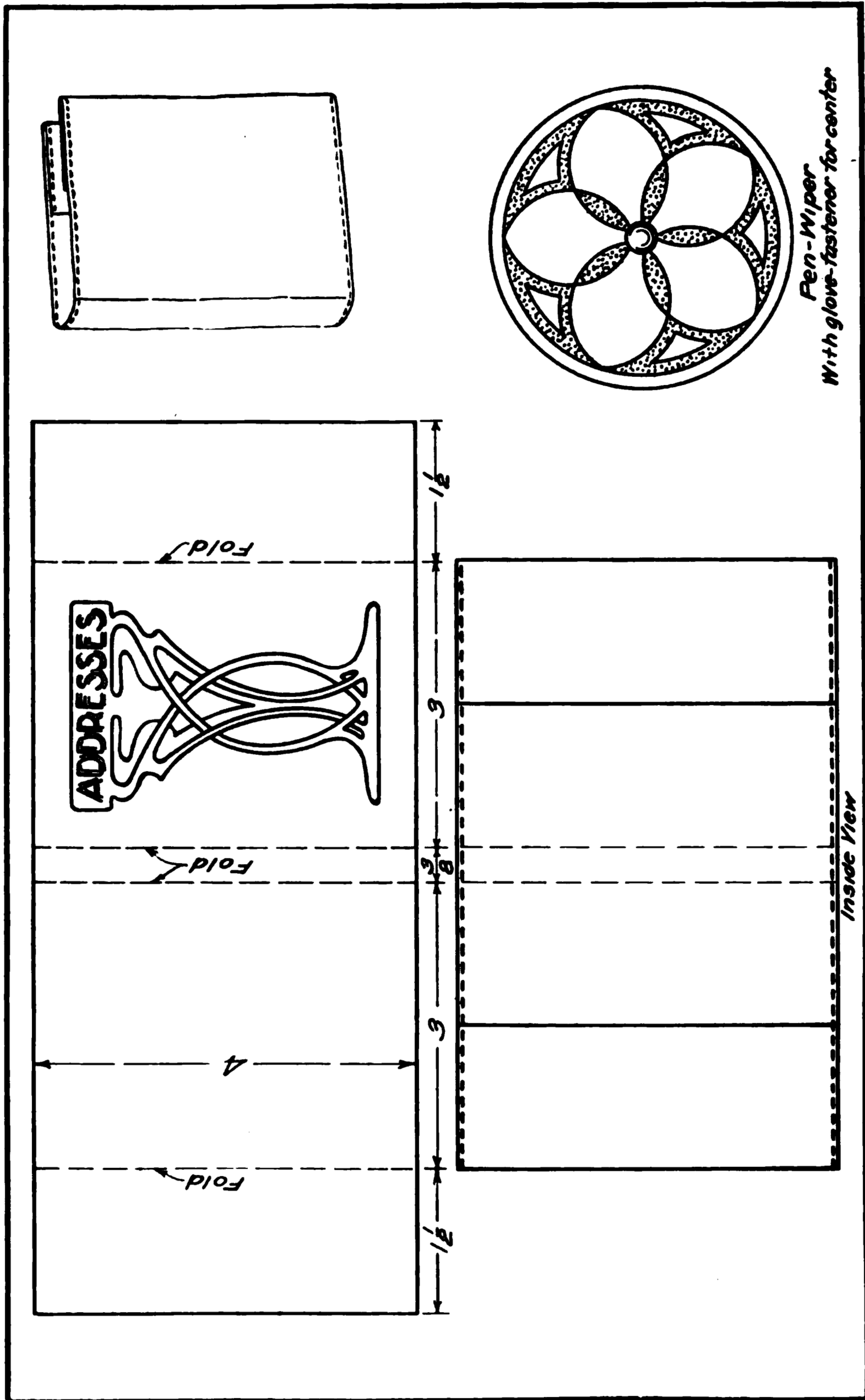


Fig. 39. Ooze Leather Address-Book Cover. Colored Decoration. Pen-Wiper.



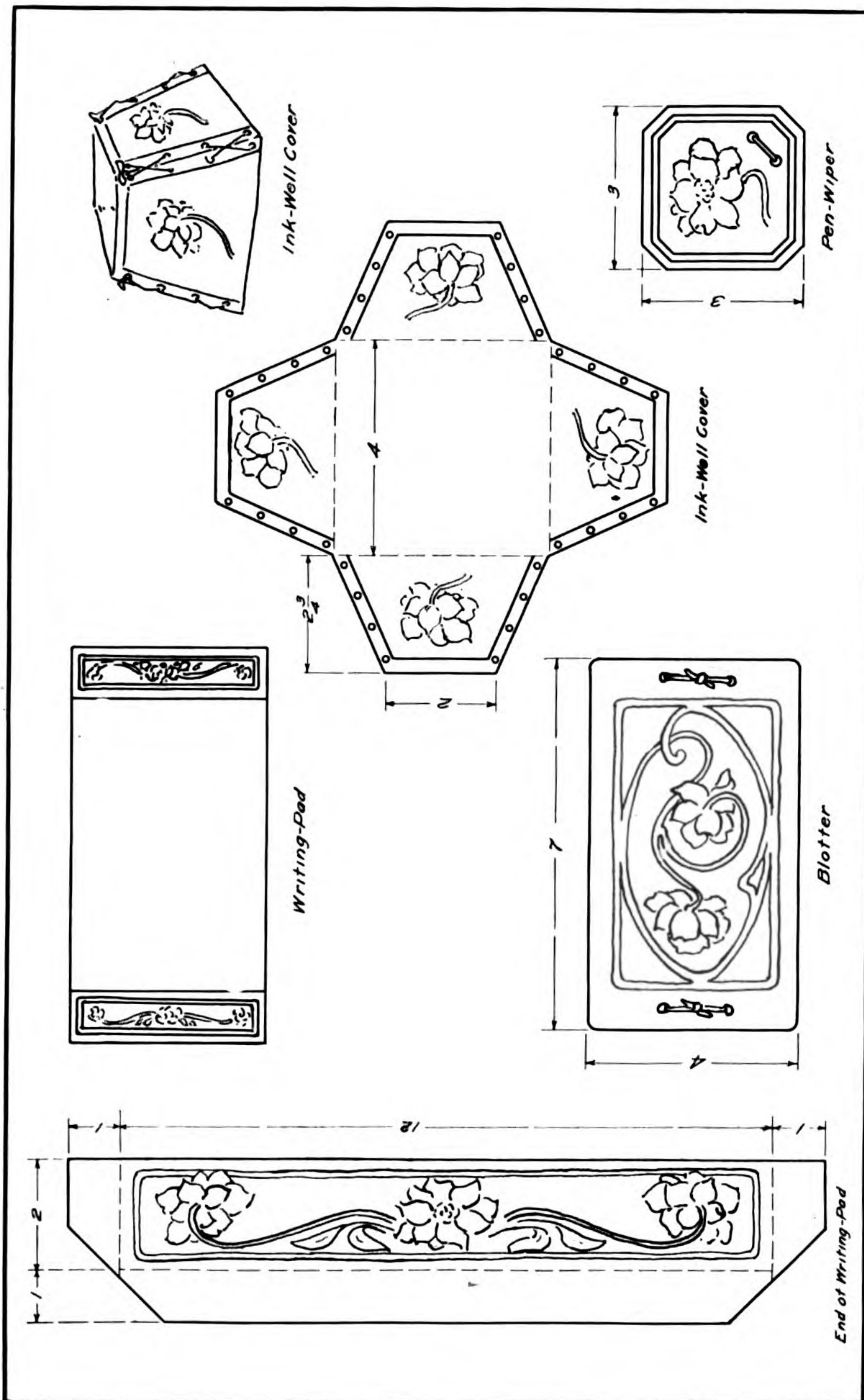


Fig. 40. Desk-Set in Tooled and Colored Leather



# Books on the Manual Arts

---

## **CLASSROOM PRACTICE IN DESIGN.** By James Parton Haney.

A concise, up-to-date, richly illustrated brochure on the teaching of applied design. Price, 50 cents.

## **THE WASH METHOD OF HANDLING WATER-COLOUR.** By F. F. Frederick.

A brief, clear, comprehensive text printed in sepia and illustrated with wash drawings and a water color painting by the author. Price, 50 cents.

## **ART METAL WORK.** By Arthur F. Payne.

A textbook written by an expert craftsman and experienced teacher. It treats of the various materials and their production, ores, alloys, commercial forms, etc.; of tools and equipments suitable for the work, the inexpensive equipment of the practical craftsman; and of the correlation of art metalwork with design and other school subjects. It describes in detail all the processes involved in making articles ranging from a watch fob to a silver loving-cup. It is abundantly and beautifully illustrated, showing work done by students under ordinary school conditions in a manual training shop. The standard book on the subject. Price, \$1.50.

## **PROBLEMS IN MECHANICAL DRAWING.** By Charles A. Bennett.

This book consists of 80 plates and a few explanatory notes, and is bound in heavy paper covers with brass fasteners. Its purpose is to furnish teachers of classes beginning mechanical drawing with a large number of simple, practical problems. These have been selected with reference to the formation of good habits in technique, the interest of the pupils, and the subjects generally included in a grammar and first-year high school course. Each problem given is unsolved and therefore in proper form to hand to the pupil for solution. Price, \$1.00.

## **CLAY WORK.** By Katherine Morris Lester.

This book was written by a grade teacher and art worker to help teachers in acquiring the technique of clay working, and to give them suggestions concerning the teaching of the several types of clay work suited to pupils in the elementary schools. It covers the study of natural forms, the human figure in relief, and the round, animal forms, story illustration, architectural ornament, tiles, hand-built pottery, and pottery decoration. The book is richly illustrated with more than fifty half-tone and line cuts showing processes, designs, and the work of children from ten to twelve years of age. Price, \$1.00.

## **DESIGN AND CONSTRUCTION IN WOOD.** By William Noyes.

A book full of charm and distinction and the first to give due consideration to the esthetic side of wood-working. It is intended to give to beginners practice in designing simple projects in wood and an opportunity to acquire skill in handling tools. The book illustrates a series of projects and gives suggestions for other similar projects together with information regarding tools and processes for making. A pleasing volume abundantly and beautifully illustrated. Price, \$1.50.

## **CORRELATED COURSES IN WOODWORK AND MECHANICAL DRAWING.** By Ira S. Griffith.

This book is designed to meet the every day need of the teacher of woodworking and mechanical drawing for reliable information concerning organization of courses, subject matter, and methods of teaching. It covers classification and arrangement of tool operations for grades, 7, 8, 9 and 10, shop organization, allotment of time, design, shop excursions, stock bills, cost of material, records, shop conduct, the lesson, maintenance, equipment, and lesson outlines for grammar and high schools. It is based on sound pedagogy, thorough technical knowledge and successful teaching experience. It is practical. Price, \$1.50.

## **ESSENTIALS OF WOODWORKING.** By Ira S. Griffith.

A textbook written especially for the use of grammar and high school students. A clear and comprehensive treatment of woodworking tools, materials, and processes, to supplement, but not to take the place of the instruction given by the teacher. The book does not contain a course of models: it may be used with any course. It is illustrated with photographs and numerous pen drawings. Price, \$1.00.

## **PROBLEMS IN FURNITURE MAKING.** By Fred D. Crawshaw.

This book, revised and enlarged, consists of 43 plates of working drawings suitable for use in grammar and high schools, and 36 pages of text, including chapters on design, construction and finishes, and notes on the problems. Price, \$1.00.

---

Published by

---

**The Manual Arts Press, Peoria, Illinois**

"Books on the Manual Arts," a descriptive catalogue, sent free on request











This book should be returned to  
the Library on or before the last date  
stamped below.

A fine is incurred by retaining it  
beyond the specified time.

Please return promptly.

NOV 9 '71 H

3520390



