Design Hints For Memorial Craftsmen

January 1926, Vol. II, No. 7

Published Monthly at St. Cloud, Minnesota
Dan B. Haslam, Editor and Publisher

This magazine, which begins on the next page, is presented on the Stone Quarries and Beyond web site.
http://quarriesandbeyond.org/

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November 2012
“I look upon instruction by mail,” said the late Theodore Roosevelt, “as one of our most wonderful and phenomenal developments of the age.”

JANUARY, 1926

Volume II

Number 7
COMPLETE

DESIGN—A service that has been of great benefit to retailers for years.

GRANITE—Melrose Red and Melrose Gray—The unprecedented sale of these during the last 10 years is their best recommendation.

PRODUCTION—An institution that is equipped throughout with every kind of machinery to do any kind of work in memorial building.

SERVICE—A competent organization that invites inquiries and renders a daily service on anything pertaining to your business problems.

Only the world's largest could have this

Melrose Granite Company
St. Cloud, Minn.
Rex Auburn Continues To Gain New Friends

Here's a new type of St. Cloud that was discovered only a few months ago. The quarry already has been developed and Rex Auburn is going out in large quantities.

In color and fine texture it is a little different than anything we have seen in the district. Ask for samples.

Rex Granite Company
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
The House of Seven Getting A Good Start For A New Year

We are placing orders on our books now from various parts of the country for spring delivery and many of these come from customers we have sold for several years.

All indications point to a big year for Universal and we suggest that you get your orders in early for spring. Tie up with Universal this year. We want to show you the service you get at prices that are consistent with good business and workmanship that is without a peer.

Universal Granite Co.
The House of Seven Brothers
Jos. F. Trebtoske, President
ST. CLOUD, MINN.

Say you saw it in DESIGN HINTS
Granites and Craftsmanship
Backed by a Definite Policy.

Simmers has been for years rendering a service to the retailers of the country that nothing can replace. Granites and ideas, design and workmanship—these have been elements in this service, but the outstanding feature of it has been the effort on the part of this company to protect the retailer at all times and follow up each order with an active interest until it is finally placed.

We should esteem it a favor to be of assistance to you in shaping your program for the spring.

A. M. SIMMERS & SONS
A. M. Simmers  A. W. Simmers  George M. Simmers
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
We Are Now Prepared To Take Care Of Your Spring Needs

Our quarries and plant have been inspected and new machinery put in where needed to give us ample production for good service on early spring orders.

United has the designs, the granites and the craftsmanship, an organization of owners who are responsible for the work turned out by being directly connected with it.

This assures you 100 per cent. service in anything given to us.

Let United take care of your spring needs this year.

UNITED GRANITE CO.
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
Connecting Two Outstanding Elements in the Fine Memorial

Design, carried out in faultless craftsmanship and

RED PEARL, to assure faultless material for artist and finisher.

Keep both in mind when planning for your spring business.

St. Cloud Granite Works
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
REFLECT on the SHINE

(Copyright)

After all the polish you get is gratifying only when there is a basic element in the material itself to bring out the shades in all their beauty.

Peerless Black stands out like a lustrous gem, casting shafts of beauty to places otherwise unattractive. We suggest it as a real feature for your display room. Buy it in quantities with the knowledge that it will sell readily.

Peerless Granite Company
Little Falls, Minn.

Say you saw it in DESIGN HINTS
We are Confident the Spring Needs Will Include Pyramid

There are three outstanding granites from which to select and they go well together in any display room.

Each with a distinct attractiveness all its own, whether in shade or texture. They make up well in memorials that are for particular customers.

Pyramid Granite Works
Incorporated
St. Cloud, Minn.
Two Features That Make Hunter’s Mahogany a Good Buy

The certificate of warranty, stamped on each memorial, is assurance to your customer that he is buying something out of the ordinary; the exclusive feature which gives you rights in your territory.

We suggest a good supply of Hunter’s memorials in the original Hunter’s Mahogany for a good spring volume.

Quarriers and Manufacturers

HUNTER’S MAHOGANY MILBANK, S.D.

Hunter’s Mahogany Memorials

ROBERT HUNTER
Milbank, South Dakota

Say you saw it in DESIGN HINTS
HELP US TO HELP YOU.

DESIGN HINTS is well into its second year. What value a publication of this type will be to those for whom it is published is something that cannot be predicted. Time alone will tell what a magazine of the nature of DESIGN HINTS can do for its readers. We feel that our book has been in the hands of our readers for a time sufficient to warrant our taking an inventory of its intangible value, if you will permit the expression.

Just to mention the ideals upon which our publication is based. It has been our effort, to develop a magazine valuable not to the proprietor, or to the man on the road, or to the man in the shop alone, but to the proprietor, the man on the road, and the man in the shop collectively. We have aimed at a publication that would be an aid to every branch of the industry. We have tried to compile our copy of articles and material of such a nature that DESIGN HINTS would be beneficial to everyone in the industry. We are now asking you whether we have succeeded?

We are inviting criticism and asking for suggestions. Tell us what you want. If our articles are not the type that prove helpful to every man in the craft, we want you to tell us. If our choice of copy has been wrong, let us know, and "there'll be some changes made". This is your magazine. It is published as our contribution for the betterment of the industry, and if we are failing to do that, our efforts are wasted, because we are doing you no good. So again we ask you to tell us what you want. Inform us if you have any pet ideas in the way of design. If you have, and wish to see them worked out, you can do so for the cost of a stamp and of a photograph—if you care for a photograph of the finished idea—providing you permit us to use your idea in the pages of DESIGN HINTS for the benefit of the industry at large. If there are any articles of a particular nature that you feel would be of value to our readers, drop us a line, and if we aren’t capable of putting your ideas on paper, we’ll hire someone to do it for us.

Personally we are more than elated over the support we have received, and, to show our appreciation, we are going to expand. More articles, more instructive illustrations, more designs, and, we hope, more advertising. But just because we are going to expand of our own accord, we don’t want you to stop helping us. We need your ideas, and we want you to let us know what they are. You know our address!
Monumental Drawing and Lettering

WASH DRAWING
Copyright 1926 by Dan. B. Haslam

Some teachers induce the belief that painting in water color can be achieved without first learning how to draw. This is not true. Painting is simply the art of drawing in color and cannot be separated from drawing.

Many draftsmen who are strong in drawing, fall down miserably in color work. The reasons for this, in most cases is because of not only a lack of knowledge as to the mixing of color, but awkwardness in the handling of the brush as well.

Skill in handling the brush is acquired only by constant practice. The brush demands great lightness of the hand. Held somewhat like a pencil between the thumb and index finger of the hand with the little finger only resting on the paper, light strokes from side to side are made with the point only of a well filled brush. The working arm should never support the body and should not rest on the drawing.

Before proceeding with further instruction in connection with wash drawing it will be necessary to say something about materials.

The object of this lesson is to aid the student in the making of simple wash drawings applicable to memorial work and for the present only one, color will be considered.

Architects generally use India Inks for rendering because of their clean quality. These may be purchased in stick form from any drawing supply house. This color has to be ground before using however and for the student is no more satisfactory than ordinary Lamp Black which may be purchased in either pan, or tube form, preferably the latter as it is less likely to harden and dry up.

Camel’s hair or Sable brushes may be used for work of this character. Camel’s hair brushes are much cheaper in price but are not nearly as satisfactory to work with. If Sable brushes are used sizes 7, 8 or 9 will do for rendering the larger surface of a drawing while a smaller brush about a number 5 is best for rendering details of carving and lettering.

Whatman’s “cold pressed” paper is considered best for water color rendering, although any good water color paper will do for practice. Water-color board is also used to good advantage, but is too expensive for the student.

If the student takes a piece of water color paper, tack it to his board and then begins to “wash in” his drawing without first treating the paper or stretching it as it is called, he will experience some difficulty because the surface of the paper will become crinkled and this of course will entirely spoil a flat wash.

Stretching the paper is easily accomplished and is handled in the following manner.
First secure a small sponge and some good strong paste. Now thoroughly soak the paper in cold water being careful to keep it clean and not tear it. After the paper is thoroughly soaked, squeeze the sponge well, press out some of the water all over the surface with the sponge until the paper lies quite flat on the drawing board. Now lift up the edge of the paper and paste the board about an inch underneath the edges of the paper all the way round, then press the paper down and leave it. When the paper dries its surface will be smooth and just right for our wash drawing, and will not wrinkle no matter how much color we use. Be careful however, not to remove the
paper from the board until the wash drawing is complete and thoroughly dry. Then by using a sharp knife carefully cut around the drawing leaving as much of a white margin as possible.

We now have our color, brushes and paper all prepared and are ready to begin our rendering.

The object should be carefully outlined in light pencil marks of course as we need correct guide lines. If these pencil lines are drawn very light they will hardly show up in the finished rendering and we do not want them to if we can help it.

Now secure two or more small cups, or any small dishes, not easily tipped. One of these will be for clean water and the others for the color mixtures.

It is best for the student to begin with a very light flat wash. It is difficult to lay an even dark tint with one wash only. By a flat wash is meant a wash which is the same tone or color throughout, a wash that is not graded. A graded wash is one which goes from light to dark or dark to light in the same plane. Graded washes will be left alone for the time being.

As before stated mix your colors very thin for the first wash. Use Fig 1 in the accompanying Plate as an example to copy.

Tip the drawing board slightly so the colors may flow slowly in the direction in which they are being carried. If the board is placed flat there is danger of the color running back over the part already dry and thus forming streaks as shown in Fig. 2.

Dip the brush lightly in the tint and when you are satisfied it is well filled, lay the wash by starting in the upper left hand corner and working the brush evenly from side to side, carry the color a little down the sides of the rendered surface after each side stroke. Be sure that the brush is well filled with the tint at all times, for if the brush is allowed to get too dry, one part of the wash will dry faster than the other and streaks will result. Do not attempt to remove color from the brush by touching the side of the cup before rendering. If you think there is too much moisture in the brush give it a slight shake over the cup. This will eliminate any danger of the color leaving the brush before you are ready.

The edge of the wash should always be kept wet, for if it begins to dry streaks will surely follow. Carry the tint evenly across the board, moving the brush as rapidly as possible from side to side so that one side does not advance faster than the other. After filling the brush carry the tint down about an inch each time, the amount depending on the size of the brush and of the surface rendered. Always go over the previous half inch or so with each new advance but be careful that you do not go over any part that has already dried.

If the work has been properly executed, and the brush kept well filled at all times, there will be a pool of color left at the bottom of the rendered surface. This pool may be removed by first drying the brush on blotting paper and then applying it lightly to the surplus tint which will be rapidly absorbed by the brush. Be careful not to remove too much of the tint or streaks will be sure to show.

The drawing board should be left inclined until the wash is dry.
NEVER lay one wash over another before the previous one is absolutely dry.

Fig. 1 our Plate shows a light even flat wash.

Fig. 2 shows a streaked surface that may be easily duplicated by any beginner. This is the easiest to secure of any of the tones and is the best one to keep away from. If your rendering presents such an appearance, you may have been guilty of several errors all of which will produce the same results, viz:—tint too dark for the first wash; dirty colors; too dry a brush, hence uneven drying; failure to carry color evenly from side to side; failure to go back over a part of the drawing with each new advance, or going back so far that a part that had already dried was touched; laying another wash before the previous one is thoroughly dry.

A dark tone as shown in Fig. 3 is the hardest of any to obtain. The student will do well to mix his tint but little heavier than that as shown for the rendering in Fig 1. A series of washes one over the other after the previous one is thoroughly dry will produce results as shown in Fig. 3, better than to attempt to lay a single wash of heavy color.

Fig. 4 shows two renderings in wash. The light tones were carried completely over the surfaces of the memorials and allowed to dry before the darker tones were placed. Details of carving were placed by using a heavy color and a small brush.

Fig. 5 illustrates a method of making quick attractive sketches for your prospect. The drawing is made in pencil and the dark parts only, rendered in wash. A slight touch of color in the background around the memorial makes a sketchy appearing work that will often produce the same results you would get with a more elaborate drawing.

Figs. 6 and 7 show two methods of pencil shading for axed and rock work. Every draftsman has his own style for such work. Nothing is claimed for these examples over any other styles, except as an aid to the student in producing neat results.

WHEN PUBLICITY DOESN'T PAY

During the course of a case in his court, the judge pointed out to the jury that a witness was not necessarily untruthful because he changes a statement which he had made previously.

“For example,” he said, “When on the way down this morning I would have sworn that I had my watch in my pocket, but when I went to look at it my pocket was empty and I remembered that I left it at home on the window sill in the bathroom.”

The case finished and court adjourned, the judge made his way home.

On arriving at the house, the first words his wife said to him were:

“Will you please tell me what all this fuss is about your watch. No less than five men have been here after it.”

“Good Lord,” gasped the judge, “I didn’t send anybody! What did you do?”

“Why, I gave it to the first one, of course. He knew just where it was.”
THE OBSERVER
By G. A. NICHOLS

The year Nineteen hundred twenty-five is history; another epoch ended. The spills of the past are forgotten forever; the thrills are now memories to help make 1926 a bigger and better year. With bright, new calendars on our walls and with the gradual lengthening of the day to remind us of the coming of spring and a new business season, we are buoyant with hope. We ponder and plan to make the best of opportunity at hand; at least we are off on the right foot for the new year.

With the holiday season just over and its usual glamour and rush still fresh in mind, we review the results of an advertising and selling tie-up by retail stores, with a season rich in sentiment and feeling, in effort to boost business. As memorial merchants perhaps we wonder whether we came in for our share of advertising to the Christmas throngs. We were stirred by the glaring and impressive efforts of merchandisers from the smallest to the largest in hamlet and city, as evidenced by gorgeous window displays, interior decorations, and intensive advertising programs that marked the holiday season—all challenging the imagination. The panorama appeared vigorous yet calm, clamorous yet silent, bustling yet orderly! A maddening race yet a peaceful glide of business effort with master mind pitted against master mind, subtle, crafty, tensacious, unyielding, determined almost to the point of recklessness, warring for business yet neighborly; A final stand of the year, as it were; a gigantic effort to get each his proportionate share of the holiday business! What a change was wrought in the spectacle of our every-day business houses; what a stage setting for the battle!

Enchanting in beauty and in appeal was this transformation of the monotonous work-a-day world and its well known down-town districts. A veritable fairyland, magic and alluring in a setting of beauty and sparkling splendor that no artist could dare to imagine, with twinkling lights and striking contrast between the fragrant depths of richest evergreen and myriads of diamond-like though artificial snow flakes gleaming and blinking with joy at the gay expression, apparent everywhere, of the season’s good will. It seemed a magic power at work to lure the most timid and to make drunk with delight the most irresponsible buyer! What concerted action, each merchant for himself yet each adding his contribution to the effectiveness of the whole scene! Serenity amidst the greatest confusion; buyer enthusiasm run rampant; sheer joy in the sight, despite many unsatiated desires to own, possess, and carry away this or that beautiful or useful holiday gift. Truly a holiday season, a profitable commingling of work and pleasure by both buyer and seller!

Indescribable in magnitude, intensity and variety of offerings as well as in ingenuity of display was the entire picture. The prosaic
hardware store and meat market came into their own and were
dressed up beyond the wildest stretch of imagination. The log
chain suddenly became almost as interesting as jewelry; the links
of humble bologna assumed an air approaching the romantic! All this
gigantic effort on the part of re-
tailer in fields other than our own
to sell, sell, sell, during the holiday
time while the customer was in a
receptive mood, and the accom-
panying reaction of an enthused
buying public was merely the re-
sult of capitalizing an opportu-
nity by those merchants. These men
turned to their own advantage an
ancient custom of the people, of ex-
changing gifts; it was a play on
human emotions, (similar to those
that surge within the breast of the
legitimate memorial prospect) sim-
ply nurturing those emotions with
proper suggestions and appeals.

Some few of us in the memorial
business caught inspiration and al-
though few people are likely to buy
memorials as Christmas gifts any
more than they buy the log chain
or the bologna, we capitalized the
opportunity of attracting attention
to our places of business and to our
own enterprising management.
There might come a day when the
same persons who saw and were
impressed will come and buy from
us just because they carried away
favorable impressions. Our pros-
pective customers were in the
passing throngs!

For those of us who passed by
the opportunity of an advertising
tie-up with the seasonal appeal,
there are other times coming—
Memorial Day specifically. There
is room for endless speculative
thought when we compare with
those of other merchants just cited,
our opportunities of a seasonal tie-
up of our advertising and selling
efforts at that time. Its early, true,
but better to plan ahead than to
shift aimlessly and find ourselves
at our greatest season with no
plans made.

This does not mean only a vigi-
rous dressing up of our premises and
displays for the occasion of Mem-
orial Day but more directly, a pub-
licity campaign that will tie up
gracefully and fittingly with the
sentiment of that day in reminding
the public of its specific obligation
to take steps toward securing a
suitable and lasting tribute to the
departed loved ones—a tribute by
which the world will know not
alone on Memorial Day but on
every day subsequently the identity
and last resting place of those de-
parted ones as well as the tender
and real devotion of the bereaved
as expressed by the quality of the
memorial. What an opportunity to
perform a real service for that un-
thinking public and to stimulate
our own business! In 1926 lies our
opportunity; we shall profit by the
experiences of 1925.

WHY WORRY

After much excitement the
Smiths at last had managed to get
under way on their motor trip. As
they drove along they began to
wonder if they had left anything
behind.

Mrs. Smith gave a shriek. "Oh
Henry," she gasped, "I forgot to
turn off the electric iron!"

"Don't worry, darling," he re-
plied, "nothing will burn. I forgot
to turn off the shower bath."—
Associated Automotive Journal.
FREEMAN

The rock-faced memorial has had more than its share of criticism in the past few years and while such work may not appeal to all, there are many who prefer this type of design because of the natural beauty of the unfinished product. Design Hints offers the Freeman design to the trade as an example of saleable work, claiming, if nothing else, the lending of pleasing variety to the line of designs as shown through its pages.

Beautiful 1x14 photographs of the designs shown on these two pages, will be furnished by Design Hints for 75c each.
Hammered margins against polished surfaces may be successfully used in creating inexpensive panel effects. Note how well this idea is carried out in the Norden design. The sand-blast treatment of ornament is quite different in detail and outline and is so placed that its lines follow the gracefully curved top, giving the whole design an appearance of harmony and attractiveness.

Please write to the manufacturers listed in Design Hints for sizes and prices on the designs shown on these two pages.
HISTORIC ORNAMENT

By Glanville Smith.
(Copyright 1926)

SOMETHING ABOUT CURVES

Frequently we hear, and frequently too we use the expression—“Greek curves”. In most peoples’ minds the belief has taken root that a curve that is Greek is superior to all other curves. Few can say why a Greek curve is so superior, but this does not prevent those that cannot from being favorably impressed when a dealer in noting the special desirability of one of his monuments remarks: “And the curves, you’ll notice, are distinctly Greek——.”

Of course not every curve drawn by the ancient Greeks was beautiful; and it is equally true that not all non-Greek curves are inferior. But the typical Greek curve has this about it, that it is based on the parabola or the ellipse which are subtler curves to begin with than is the circle, on which the general run of curves (notably the Roman) are based. The circle is a convenient curve to draw: its center stays in one place, and its radius stays the same all around: hence we use the compass which is built to suit these conditions. Or perhaps we have a curve made up of arcs of circles—for instance the Tudor arch which is composed of the arcs of 2 large circles and 2 small, hence known as a “4-center arch.” But here is the fault that can be noticed in these: a simple circle or circular arc has an obviousness about it: we can look at it and say, here is the center, this is the radius. With the parabola or ellipse the conditions are different: the centers move, the radius is elastic. Thus these curves have a subtlety and a smoothness about them that is not to be found in curves made of arcs of circles. For this reason it may be interesting to examine these basic curves a little to see what they are like and how they “behave.”

The parabola (par-ab-o-la) and the ellipse are pure mathematical curves. In geometry they are classed among the “conic sections”, because they can be obtained by cutting a cone. (See Figures 1-A and 2-A). The cones shown in the illustration are of the most familiar proportions—somewhat the shape of ice-cream cones in fact—but it must be remembered that a cone can just as well be long and spindling, or broad and squat.

But now suppose we have such a cone, say a well-shaped carrot, and cut down thru it in a direction parallel to the slant of one of its sides—what shape will that cut expose? The answer is, a parabola. If we take a deep cut and so slice away almost all of the cone (or carrot) we shall make a long slender parabola; if we take a cut farther up, where the cone has belled out, we shall produce a broad parabola. A “family” of such parabolas is shown in Figure 1-B, the inmost one resulting from a deep cut, the next one from a cut not so deep, etc. A curious fact about the parabola is, that no matter how long it is drawn out it continues to curve, and yet the two lines
never come to be parallel with one another, and never meet. It is easy to visualize why this is true: for the longer the cone itself is drawn out the bigger it grows. In Figure 1-C the parabola has been used as the basic curve in the profile of a classic vase.

From our cone (or carrot) we can obtain the ellipse in a similar manner, only this time we will take our slice across and thru the cone. (Figure 2-A). Such a slice at a steep angle will produce a long narrow ellipse, or one at only a slight tilt will give a short broad one; and if the cut is made straight across, we shall obtain that particular kind of an ellipse known as a “circle”. Thus the circle is one of the conic sections, and also actually an ellipse, altho it is practically never called by this name, being a special and important study in itself apart from all other ellipses. An ellipse mathematically correct is shown in Figure 2-B. In Figure 2-C an application of the ellipse is illustrated: here a quarter of the curve has determined the contour of a moulding. Imagine a quarter of a circle used in the same place and at once the superiority of the elliptical are will be apparent.

In the matter of usefulness the ellipse is far more important than the parabola. To begin with it is a complete figure in itself, not running off out of bounds like the other does. Then, it can be drawn with a fair degree of mechanical
accuracy, whereas the parabola must be plotted point by point from a mathematical expression to be a pure parabola: this is altogether too irksome a task for any but the most finicky and long suffering designers. Hence the parabola is usually drawn by eye, and as there are an infinite number of parabolas the draftsman with a knack at drawing smooth-flowing curves is likely to hit one of them.

There are a number of methods of approximating and plotting the ellipse. A mathematically perfect method useful in full-size detailing is as follows:

We shall assume that the length and breath of our ellipse are known. Lay out this long axis then, with the short axis crossing it at its mid point. Now with a compass take half of the length of the long axis—that is, from the mid point to one end—and with this distance as a radius, and one end of the short axis as a center, strike arcs so as to locate points F and F on the long axis. These are the "focal points" or "foei" of the ellipse. Once they are located, proceed as follows: Set a pin at each of the 2 focal points, and a third pin at one end of the short axis. Tie around these 3 pins a tight loop of cord, which loop will be in the form of a triangle extending from one focal point to the other, and up (or down) to the end of the short axis. Remove the third pin (at the end of the short axis) and put the point of your pencil in its place, and, keeping the loop of cord tight, draw your ellipse. To those who have never tried this method it will come as a surprise to see what a beautiful smooth

(Continued on page 22)
GRANITE CHIPS

A BUSINESS OF THREE GENERATIONS

The inserts show an attractive monument shop and its well known proprietor "Jamie" Horne and grandson "Jamie II." Mr. Horne has been closely associated with a large number of our Craft because of his earnest endeavors along the lines of organization and he was the first President of the Minnesota State Association. He has been in business thirty years.

His shop is nicely located one-half block from the principal business street in Luverne, a town of about 3000 population, the county seat of Rock County, Southwestern Minnesota, bordering on the States of Iowa and South Dakota in a prosperous agricultural territory.

Mr. Horne supervises the manufacture in his shop of the major part of his stockwork which re-
reflects the newer ideas in design.

He has had two children, a son and a daughter; the son is an expert granite cutter, and the daughter died of influenza while engaged as a nurse in the World War. Mrs. Horne looks after "Jamie" as well as their substantial home adjoining the shop.

Mr. Horne is active in civic affairs in Luverne having been a councilman for several terms.

**SOMETHING ABOUT CURVES**

(Continued from page 20)

flowing curve is produced. But cord will stretch, and likewise it must have a knot in it, which makes this method not altogether desirable for small-scale or fine drawing. Mathematically it is perfect, creating a true pure ellipse; and for large scale work it is a practical method. A little experimenting will show that the farther apart the focal points are, the slenderer the ellipse; whereas the closer together they are set the fatter the ellipse. When the two foci merge into one at the mid point your ellipse will be a circle.

Such is the story of "Greek curves" in a narrow sense. In reality, the Greeks probably drew their beautiful curves by eye.

The science of mathematics makes a very extensive use of pure curves, some of which are notable for their beauty, and an inspiration to the designer-craftsmen. Some of these are shown in Figures 3, 4, 5, and 6.

When the path of a single point on the circumference of a small circle being rolled around inside a larger circle is plotted, we find it to be in the form of scallops. This path is known as the hypocyc-
cloid (pronounced hip-o-si-kloid). The Brothers Adam, Renaissance designers, made extensive use of this curve: an example of its use in a fan-like motif can be examined in the Historic Ornament article in the October 1925 issue of Design Hints. Likewise, another fan motif inspired by a curve called the Witch of Agnes (Figure 4) can be found in this same article. Figure 5 illustrates the Limaçon. “Limaçon” is the French word for “snail”—it would seem more appropriate to have chosen the word for “lima-bean.” But as one examines this bean-like curve one grows to respect it as a basis for design. Does it not suggest almost at once the peacock, body erect and tail wide spread? Three spirals are shown in Figure 6. 6-A is the usual spiral—it suggests the snail much more than the limacon does. 6-B is another: it reminds us of the cushion and volute of the Greek Ionic column-cap. 6-C, a scroll-like spiral, is known as the Litus. Napoleon’s sarcophagus in the Invalides, Paris is a very familiar example of the use of this curve in memorial art. Spirals are, in fact, extremely useful in decorative art of any kind.

Very gradual curves are often difficult to detail. The laying out of the entasis or tapering on a column is a familiar problem of this sort. There are various methods of determining this subtle curve, one practical method, especially suited to columns of a size generally employed in mausoleum design is as follows:

First let it be understood that as a general rule a column-shaft is straight one-third of the way up. Thus the radius of a shaft is the same at a point one-third of the way up as it is at the bottom. But from this one-third point the column tapers, until at the top of the shaft the radius is five-sixths as great as it was at the bottom. These are standard conditions, from which actual design never deviates very greatly.

We lay out our column height, then, with sides parallel to the center-line up to the one-third point. From here on the radius will gradually shrink, we know, and it is our purpose now to locate and lay out a series of radii throughout the upper two-thirds of the shaft. (See Figure 7).

To this end we divide the upper two-thirds into several parts—six is a good number—thus locating several levels at which we can lay out our radii.

Now at the one-third point, using the bottom radius, strike a half-circle as shown. The larger-scale sketch in Figure 7 is an enlargement of this part of the process. The top radius will, we know, be five-sixths as great as the bottom radius: five-sixths of the way out from the center line, then, we draw a line parallel to the center-line. Where this new line cuts the semicircle draw a horizontal line—this represents the radius at the top of the shaft as we already know. Now we divide the space between this line and the base-line of the semicircle into as many parts as we divided the upper two-thirds of the shaft. In the illustration the number of parts chosen has been 6.

And now, mopping our brows

(Continued on page 26)
OH GEE! Moulds

NONE SO BLIND

He: “Your husband looks like a brilliant man. I suppose he knows everything.”
She: “Don’t fool yourself. He doesn’t even suspect anything.”

JUStIFIED

“Judge, yo’ honah,” complained an irate colored lady, to the court, “dis yeah no time for a real man to count his money.”
“Yassuh, jedge, yo’ honah, Ah does drink some,” admitted the husband. “But, jedge, dat woman don’t treat me right. Why, I pauns de kitchen stove t’ git a lil’ money an’ she don’ miss it fo’ two weeks.”

A WAY TO SAVE IT

“You’re lookin’ bad, Wullie.”
“Aye, I’ve been in the hospital an’ the doctors have tooken away ma appendix.”
“These doctors’l tak’ anything. It’s a peety ye didna have it in yer wife’s name.”

FINAL PROOF

Brown: “Do you think the dead can communicate with us?”
Black: “I know they can’t. Once I managed to borrow a dollar from a Scotchman. A week later he died, and I haven’t heard a word since.”

Eat, drink and be merry, and tomorrow you can diet.

INCriminating

A clergyman gave out the hymn, “I Love to Steal Awhile Away,” and the deacon who led the singing began: “I love to steal—” but found that he had pitched the note too high.

Again he began: “I love to steal—” but this time it was too low. Once more he tried “I love to steal—” and again got the wrong pitch.

After the third failure the minister said, “Observing our brother’s propensities, let us pray.”—Western Christian Advocate.

“YOU ARE NEXT”

“So you graduated from a barber college. What is your college yell?”
“Cut his lip, cut his jaw; leave his face raw, raw, raw!”

SHOE SPARKS

Customer: “Will these shoes wear long?”
Dealer: “Wear long? Why, sir, nobody has ever yet come back for the second pair!”—Progressive Grocer.

ONCE WAS ENOUGH

Barber: “Shall I go over that chin again, sir?”
Victim: “No, I heard it all the first time.”
RE-ELECTED—

ROYAL Granites are like outstanding statesmen. They are returned to popular favor, year after year, with increasing majorities.

There are new and admiring followers in each campaign. Let Royal Granites brighten your prospects for success in the coming campaign.
SOMETHING ABOUT CURVES

(Continued from page 23)

and lighting a fresh cigarette, we come to the climax: for each of the lines just drawn in the semicircle will determine a radius on the shaft. For instance, the base line of the semicircle is the radius of the shaft at the one-third point, where it is already located. The next line up, measuring from center-line to semicircle gives us our radius at the first section above; the second-line, measured the same way, gives us the second, etc.; until, when we reach the top line and the top section, we have the top radius chosen before hand, five-sixths (or thereabouts) of the bottom radius. By this means we have located a number of points along our curve or entasis. The curve itself can, if convenient, be drawn along a flexible steel straight-edge bent so as to conform to the points located. Or if this is difficult or impossible, and the number of points located be 5 or 6 or more, join them with straight lines: the curve is so slight that the angles between line and line will be practically invisible. In fact, the process of cutting the actual stone will efface these angles altogether.

If you have trouble with your furnace, give it one of your cigars and it will probably stop smoking.

A "bonanza" is a hole in the ground owned by a liar.

A flirtation is attention without intention.

---

Given A Motor—Man Can Do Anything.

THE CRANE IS THE IDEA

They will do for your shop what large gangs of men could not do. There is no limit to the work of the crane.

Ask us for details.

GRANITE CITY IRON WORKS,
St. Cloud, Minn.

THE MACHINE NEEDS THE MOTOR

It is the underlying factor of modern progress. We are specialists in granite producing motor equipment.

GRANITE CITY ELECTRIC COMPANY
St. Cloud, Minn.

Overhead Cranes Reduce Overhead Costs

Say you saw it in DESIGN HINTS
MORE SALES  BIGGER PROFITS

BLUE "OGLESBY" GRANITE
REGISTERED

OGLESBY GRANITE QUARRIERS
ELBERTON, GA.

ROUGH STOCK  SAWED SLABS

Ideal Granites Finished in an Ideal Way.
St. Cloud Red and Gray and all Eastern Granites

Ideal granites produce memorials that become popular on sight. We should be pleased to give you estimates on this design.

IDEAL GRANITE CO.
St. Cloud, Minnesota

Say you saw it in DESIGN HINTS
Genuine New Westerly is adaptable to ANY DESIGN TREATMENT

Whether it be polished, hammered or rock finish, New Westerly answers every requirement of the designer. He may extend himself in conceiving new ideas, knowing full well that any intricate details he may wish to carry out in his design will be faithfully and artistically reproduced in the finished product. Diamond point and sand-blast treatment as shown in the Moore design is something new and will show up best only in our incomparable Genuine New Westerly Granite.

WRITE FOR SIZES AND PRICES ON THIS EXCLUSIVE DESIGN

NEW WESTERLY GRANITE CO.
MILFORD, NEW HAMPSHIRE.

Proprietors of the famous Smith Granite Quarry of Milford, N. H.

Say you saw it in DESIGN HINTS
Substance Without Expense Is Crocker Design Feature

It's very outline indicates detail and style yet, because of its simplicity of conception it may be so reasonably priced that it will become a ready seller, and it should be attractive in any display room.

Grewe has the craftsmanship, and the granites to make of this memorial all that the design calls for.

Write for our estimates on the Crocker design.

Grewe Granite Co. Wholesale exclusively
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
You will like

“ROSE RED”
GRANITE FOR MONUMENTS

Sold in the rough only, by the PIECE OR CARLOAD

EMPIRE QUARRYING COMPANY,
ST. CLOUD, MINNESOTA

Say you saw it in DESIGN HINTS
We Can't Call On Your Customers—

But we can make him call on you. Our black in your display room will bring your admiring prospect into your place of business.

It is because it is just a little different that this is the result.

Sold exclusively by W. C. Townsend & Co., St. Cloud, Minn.
Little Falls Black Granite Co.
Little Falls, Minn.

How About a Display of Mahogany?

If it is Minnesota Mahogany it will attract new and profitable business to your door.

We know because we have been told by many retailers who have tried.

National Granite Company
St. Cloud, Minn.

Say you saw it in DESIGN HINTS
Featuring Six Outstanding Granites For Spring Display.

North Star has them, all leaders. Four of these are distinct—have enjoyed a real reputation over a period of years. Look to North Star for spring display. We have a wide range and they are made into memorials by craftsmen who spare no pains to give you the best ultimate result.

North Star Red  
Indian Red  
Pioneer Dark Gray  
Black Diamond

Figure with North Star for your spring requirements and let us give you the variety that will help you to a substantial increase.

North Star Granite Corporation  
St. Cloud, Minn.

William Campbell  
President  

Olof Frick  
Vice Pres.  

Dave Alexander  
Treasurer  

John Campbell  
Secretary

Say you saw it in DESIGN HINTS
KEEP SUPERIOR
RED
and
GRAY
in mind
FOR SPRING
NEEDS

They will help you to new business

Granite City Granite Company
The Ahlgrens
St. Cloud, Minnesota
It Is Not Always The Gain---
There Are Policies, Too.

Townsend & Co., have not been in business
70 years for the profit alone.

There are other things about a business that
attract men to it and keep up their interest.

Ahead of all other considerations in the Town-
send organization is the definite policy of con-
structive merchandising and underlying all this
is the principle to stand firmly by the retailer.

You know, there is something real and tang-
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