This example shows how to create a pattern of octagons and squares in the pattern file. You can use the description here to create other patterns.

The completed pattern contains octagons that are 8 inches at their widest point; both the octagon and the square are 3 5/16 inches on a side.



- 1. Open a text editor, such as Notepad, to begin creating the pattern file.
- 2. On the first line, enter the header in this format: \*Concrete Paver.
- 3. On the next line, enter the type declaration: ;%TYPE=MODEL. The first value for a pattern descriptor is the angle at which the pen line is drawn. For example, a 0 angle indicates the line is horizontally straight; 90 angle indicates the line is drawn vertically straight.
- 4. Create the first pattern descriptor, using the following values:
  - Angle: 0

This value is the angle at which the pen line is drawn. For example, a 0 angle indicates the line is horizontally straight; a 90 angle indicates the line is drawn vertically straight.

• Origin: 0, 0

These values are the x-origin and y-origin, which indicate the start point.

• Shift: 5.656, 5.656

These values establish the x-shift and y-shift, which is the x and y distance between the start of any pass and the start of the next pass.

- Pen down: 3.3125
- Pen up: -8

Pen down and pen up indicate how long the pen is down and how long the pen is up, respectively. A negative number indicates the pen is up.

The first pattern descriptor is complete:

0, 0, 0, 5.656, 5.656, 3.3125, -8

The pattern is as shown:



- 5. Create the second pattern descriptor, using the following values:
  - Angle: 0
  - Origin: 0, 3.3125
  - Shift: 5.656, 5.656
  - Pen down: 3.3125
  - Pen up: -8

The pattern is as shown:



Because you changed the origin, the lines are drawn above the first set.

6. Create the third pattern descriptor, using the following values:

- Angle: 90
- Origin: 0, 0
- Shift: 5.656, 5.656
- Pen down: 3.3125

• Pen up: -8

The pattern is as shown:

	-		<u> </u>		<u> </u>		-		<u> </u>
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	L		L		L		L		
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		1				1		1	

Because of the 90 angle, the lines are drawn vertically, beginning to create a square pattern.

- 7. Create the fourth pattern descriptor, using the following values:
  - Angle: 90
  - Origin: 3.3125, 0
  - Shift: 5.656, 5.656
  - Pen down: 3.3125
  - Pen up: -8

The pattern is as shown:



- 8. Create the fifth pattern descriptor, using the following values:
  - Angle: 45
  - Origin: 3.3125, 3.3125
  - Shift: 8, 8
  - Pen down: 3.3125
  - Pen up: -4.6875

The pattern now looks like this:



A 45 angle has a positive slope and results in a slanted line effect.

- 9. Create the sixth pattern descriptor, using the following values:
  - Angle: -45
  - Origin: 3.3125, 0
  - Shift: 8, 8
  - Pen down: 3.3125
  - Pen up: -4.6875

The completed pattern file is:

*Concret :%TYPE=M	Paver,					
0,	0,	Ο,	5.656,	5.656,	3.3125,	-8
Ο,	Ο,	3.3125,	5.656,	5.656,	3.3125,	-8
90,	Ο,	Ο,	5.656,	5.656,	3.3125,	-8
90,	3.3125,	Ο,	5.656,	5.656,	3.3125,	-8
45,	3.3125,	3.3125,	8,	8,	3.3125,	-4.6875
-45,	3.3125,	Ο,	8,	8,	3.3125,	-4.6875



## The completed pattern.

For information on using a custom pattern file, follow the procedure in Creating a Custom Fill Pattern.

Parent topic: Custom Pattern Files