**BOX ... FILL PATTERN**

**PURPOSE**

Specifies the fill pattern to use for the interior region of a box to appear on subsequent plots (as specified via the BOX ... COORDINATES command) or boxes generated with the BOX command. Up to 100 such boxes can be specified with the BOX ... COORDINATES command.

**DESCRIPTION**

The pattern can be one of the following:

- **BLANK, EMPTY, or OFF** - no fill
- **SOLID or ON** - solid fill
- **HORI** - horizontal lines
- **VERT** - vertical lines
- **D1** - up diagonals
- **D2** - down diagonals
- **D1D2** - both up and down diagonals
- **VED1** - both vertical lines and up diagonals
- **VED2** - both vertical lines and down diagonals
- **HOD1** - both horizontal lines and up diagonals
- **HOD2** - both vertical lines and down diagonals
- **VEDD** - horizontal lines, vertical lines, and both up and down diagonals

In practice, the first 7 (OFF, ON, HORI, VERT, D1, D2, D1D2) are heavily used and the last 5 (VED1, VED2, HOD1, HOD2, VEDD) are rarely used.

**SYNTAX**

```
BOX <id> FILL PATTERN <pattern>
```

where `<id>` is an integer number or parameter in the range 1 to 100 that specifies the box identifier; and `<pattern>` is a string that specifies the desired fill pattern.

**EXAMPLES**

```
BOX 1 FILL PATTERN SOLID
BOX 2 FILL PATTERN HORIZONTAL
BOX 3 FILL PATTERN D2
```

**NOTE 1**

Boxes can be generated in two ways. You can use the BOX COORDINATES command to place boxes on subsequent plots or you can use the BOX command to draw one box immediately. The BOX FILL PATTERN command is used to specify the fill pattern of the box in either case. When the BOX command is used, the fill pattern is set to the fill pattern of the first box (i.e., `<id>` is 1).

**NOTE 2**

A BOX ... FILL PATTERN command with no arguments sets the pattern to default. Thus BOX 1 FILL PATTERN with no arguments sets the fill pattern for box 1 to default. BOX FILL PATTERN command with no `<id>` refers to all 100 boxes. Thus BOX FILL PATTERN VERT sets the fill pattern to vertical for all 100 boxes. BOX FILL PATTERN with no `<id>` and no arguments sets the default fill pattern for all 100 boxes.

**DEFAULT**

All box pattern fills are blank.

**SYNONYMS**

None

**RELATED COMMANDS**

```
PLOT = Generates a data or function plot.
BOX COORDINATES = Generate a box on subsequent plots.
BOX = Draws a box (immediately).
BOX FILL COLOR = Sets the colors for box fill patterns.
BOX FILL GAP = Sets the spacings for box hatch patterns.
```
BOX FILL LINE = Sets the line types for box hatch patterns.
BOX FILL THICKNESS = Sets the line thicknesses for box hatch patterns.
BAR FILL PATTERN = Sets the fill pattern for plot bars.

APPLICATIONS
Presentation Graphics

IMPLEMENTATION DATE
92/8

PROGRAM
LET CARTER = DATA 66 30 11 43 44 41 35 82 54 36
LET REAGAN = DATA 26 54 84 47 51 51 52 14 36 55
LET X = DATA 1 2 3 5 6 7 8 10 11 12; LET X1 = X - 0.2; LET X2 = X + 0.2

YLIMITS 1 12; YTIC OFFSET 1 1; MINOR YTIC MARK NUMBER 0
YTIC LABEL CONTENT DEMOCRATS INDEPENDENTS REPUBLICANS SP() EAST ...
SOUTH MIDWEST WEST SP() BLACKS HISPANICS WHITES SP()
XLABEL PERCENT; XLIMITS 0 100; MAJOR XTIC NUMBER 11; MINOR XTIC NUMBER 1
LINE BLANK BLANK; BAR ON ON; BAR WIDTH 0.2 ALL; BAR DIRECTION H ALL
BAR FILL ON ON; BAR PATTERN D1 D2; BAR PATTERN SPACING 2 2
BOX SHADOW HW 0 0
BOX 1 CORNER COORDINATES 70 80 73 83; BOX 1 FILL PATTERN D1
BOX 2 CORNER COORDINATES 70 85 73 88; BOX 2 FILL PATTERN D2
LEGEND JUSTIFICATION LEC
LEGEND 1 CARTER; LEGEND 1 COORDINATES 74 81.5
LEGEND 2 REAGAN; LEGEND 2 COORDINATES 74 86.5
TITLE DEMONSTRATE BOX FILL PATTERN; TITLE SIZE 5
PLOT X1 CARTER AND
PLOT X2 REAGAN

DEMONSTRATE BOX FILL PATTERN