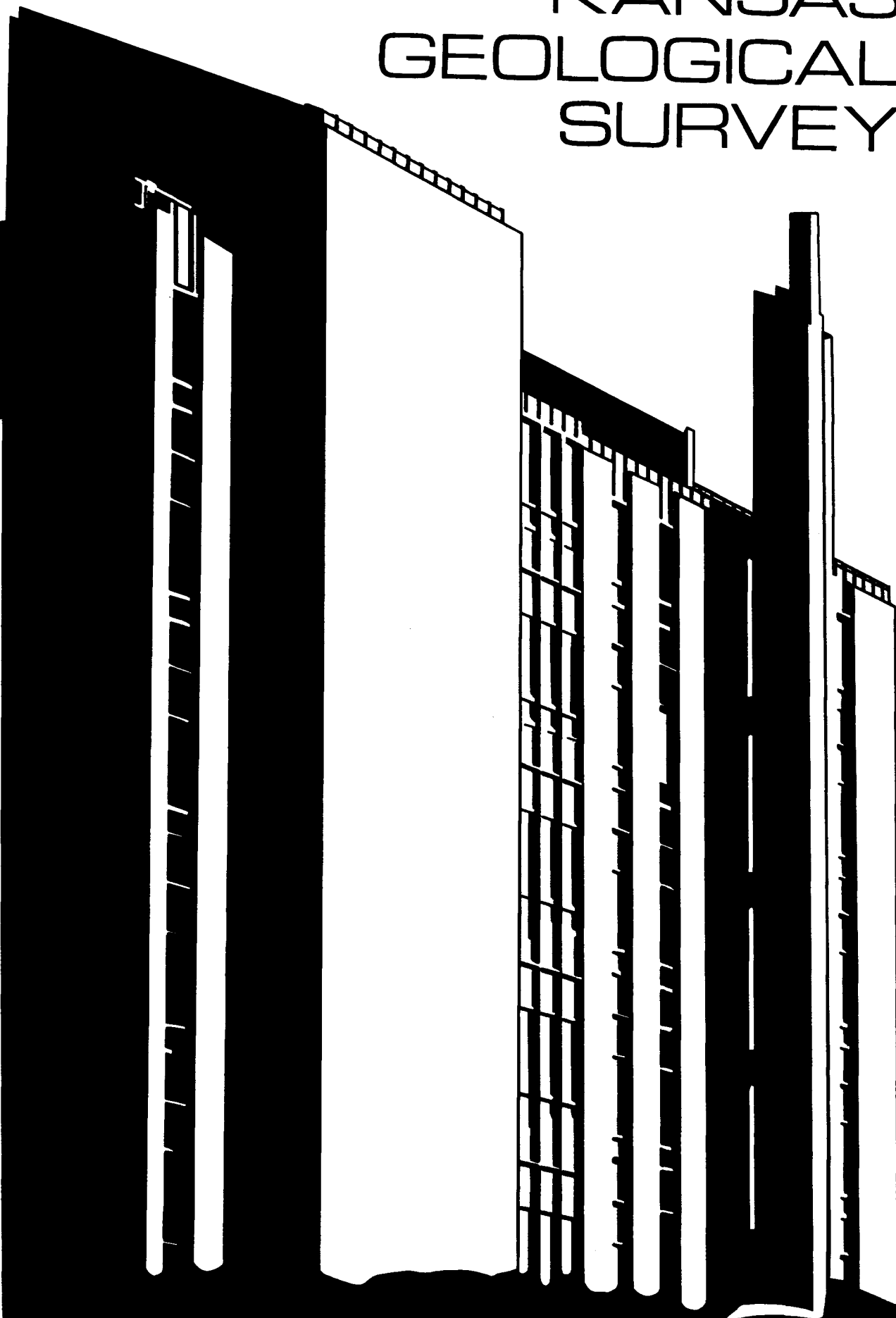


KANSAS GEOLOGICAL SURVEY

KGS OF 85-16 Shaukat, Nadeem

Progplot reference manual for HP-plotter 7475A



Kansas Geological Survey
Open-file Report

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PROGPLOT REFERENCE MANUAL

FOR

HP-PLOTTER 7475A

BY

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(1985)**

INTRODUCTION

A retrieval package is now available on MV8000 at KGS which activates the HP-PLOTTER 7475A to plot any XY-data. On execution of this package, it asks for the related information and writes the parameters and data points on a file. This information is then translated by the Plotter into mechanical movements of the pen to plot the data.

This package has the ability of plotting XY-data, vectors or writing a text. Different pen colors, symbols and line patterns are also available to distinguish multiple data sets on the same plot. The user is given a choice of changing the size of symbols and letters at various stages during the interactive computer friendly session.

The use of this package is explained here to show all of its abilities by a variety of examples.

GETTING READY FOR PLOTTING

The user must gather the following information before going to the terminal for plotting.

1. Name of DATA FILE/FILES
2. Format of DATA FILE (x-data, y-data)
3. Maximum and Minimum limits of xy-data
4. Axes Mode - Linear, Log-log or Semi-log
5. Paper size - large or small
6. Paper - Horizontal or Vertical
7. Location of lower left corner of the axes from the lower left corner of paper (X0,Y0 in inches)
8. Lengths of X and Y axes in inches.
9. Number of desired divisions on x and y axes.
10. Letters size (width,height in inches)
11. Symbol size (height in inches)

DIFFERENT PEN COLORS, SYMBOLS AND LINE PATTERNS

If you are going to plot more than one data set on the same paper, you must decide which pen color, symbol or line pattern is going to be used for each data set. Keep this information ready for the input. Following are the codes for pen colors, symbols and line patterns.

PEN COLORS	SYMBOL CODES	LINE TYPE CODES
1 - Black	10 - *	0 - Dots at data points.
2 - Green	20 - +	1 -
3 - Orange	30 - X	2 - - - - -
4 - Blue	50 - O	3 - _ _ _ _ _
5 - Purple	90 - □	4 -
6 - Red	120 - Δ	5 - - - - -
		6 - - - - -
		7 - _ _ _ _ _

PAPER SIZES AND THEIR CODES

The plotter accepts only two sizes of paper. An ordinary photocopying paper is acceptable for routine plotting. These papers are available in the top drawer of the desk under the plotter.

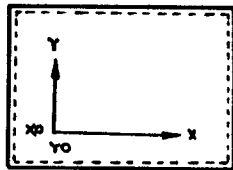
<u>PAPER SIZE</u>	<u>WORKING AREA</u>	<u>CODE</u>
Large (17 X 11 in.)	(16.3 X 10.15 in.)	1
Small (11 X 8.5 in.)	(10.15 X 7.8 in.)	4

Load the paper placing its 11 inch side against the rail of the plotter and the rear stop, and pull the paper load lever down.

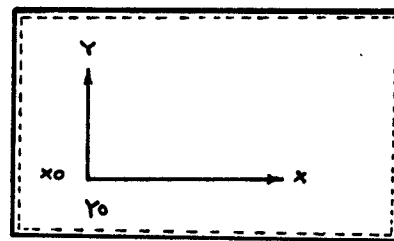
The paper directions are as follows.

Horizontal

SMALL

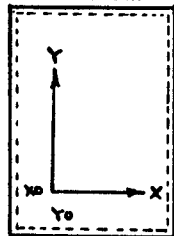


LARGE

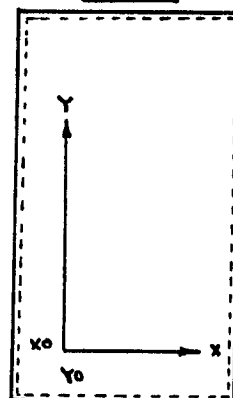


Vertical

SMALL



LARGE



FORMAT FOR DATA FILES

Data to be plotted can be in any format (I, F, or E) but the column of X-data must always be the first. The program reads the XY-data as real numbers. If the data file contains the X or Y data as integers, read them as real, specifying a real format (e.g., F2.0 instead of I2). For more details, please refer to the examples.

PROGRAM EXECUTION

The program is executable from any directory by typing X PLOT at CLI level. In response, it asks the user to

input the required information. The data filename should include the complete path name if it is not present in the current directory. In response to the question 'ENTER THE OUTPUT FILE NAME', type any file name, but remember the filename if you are working on a CRT terminal. At the end of the interactive session, go to the terminal hooked to the plotter, load the paper, and type TY FILENAME, where FILENAME is the name of the output file. The pen in the plotter will start plotting as a result.

EXAMPLES

A number of examples are included here to explain all possible plotting abilities. The first seven examples plot XY-data with a variety of options. Example 8 explains the way plot the vectors, while example 9 explains how to write a text on paper or transparencies. Please refer to the printout, data and the resulting plots for each example in the appendix.

There are a number of important points to be noted before going through the examples. These are

1. Length of axes and their position: The length of X and Y axes must be within the range of working area for each size of paper. Leave enough space to accommodate for labeling the axes. The position of axes (frame) on the paper should be adjusted by inputting X0 and Y0 values when prompted. The margins of plot axes are measured from the lower left corner of the working area.
2. Labeling the ticks on axes: After dividing the whole length of each axis into a certain number of divisions, you may wish to label the ticks. The program asks for the number of ticks to be labeled. If you have 10 divisions on X axis, there will be 11 ticks to be labeled. Then you enter whatever you want to label on each tick one by one.
3. Maximum and minimum for XY data: This information must also be provided to the program in order to set its plotting limits. Any limits are permissible for linear plots. Log-log and semi-log plots require the maximum and minimum limits to be in terms of an exponent of 10. For example, .001, .01, 10, 100, or 1000 are acceptable, but 8, 90 or 0.07 are not accepted for log plots.
4. Legend: The legend is important for distinguishing one data plot from the other within the same frame. The position for the legend is fixed by providing the distances in inches in X and Y directions from the lower left corner of the frame. If you do not have an idea where the appropriate place for writing the legend will be after all data sets are plotted, you will have to repeat the interactive session with the legend information for your final copy of the plot.

Following is the description of information provided in each example.

<u>EXAMPLE #</u>	<u>DESCRIPTION</u>
1	An ordinary XY-data plot. Data points are joined with a solid line.
2	A plot with multiple data sets in the same frame. Different data sets are distinguished with different line patterns and are indicated in a legend.
3	An ordinary XY-data plot. Data points are shown in one of the symbols.
4	A plot with more than one data sets. One of these is plotted in symbols and the other one in both line and symbol. Skipping of tick labels is also shown.
5	An example of plotting multiple data sets in different colors and line patterns.
6	This is an example of plotting the data with log axis.
7	This example shows how to plot more than one data set on the same paper but in different frames.
8	Example of plotting velocity vectors.
9	Example of writing a text.

APPENDIX - EXAMPLES

EXAMPLE 1

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= DATA

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1

ENTER LENGTH OF X-AXIS (inches)= 7

ENTER LENGTH OF Y-AXIS (inches)= 5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1.5

ENTER # OF DIVISIONS OF X-AXIS= 11

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 12

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 1

ENTER TICK LABEL #2= 2

ENTER TICK LABEL #3= 3

ENTER TICK LABEL #4= 4

ENTER TICK LABEL #5= 5

ENTER TICK LABEL #6= 6

ENTER TICK LABEL #7= 7

ENTER TICK LABEL #8= 8

ENTER TICK LABEL #9= 9

ENTER TICK LABEL #10= 10

ENTER TICK LABEL #11= 11

ENTER TICK LABEL #12= 12

WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1

ENTER X-LABEL = MONTH OF THE YEAR

SET THE Y-AXIS

ENTER # OF TICKS TO BE LABELED= 11

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 0

ENTER TICK LABEL #2= 10

ENTER TICK LABEL #3= 20

ENTER TICK LABEL #4= 30

ENTER TICK LABEL #5= 40

ENTER TICK LABEL #6= 50

ENTER TICK LABEL #7= 60

ENTER TICK LABEL #8= 70

ENTER TICK LABEL #9= 80

ENTER TICK LABEL #10= 90

ENTER TICK LABEL #11= 100

WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1

ENTER Y-LABEL= AVG. TEMPERATURE (DEG. F)

WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1

ENTER THE TITLE= EXAMPLE 1

ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12

WANT THIS TITLE ABOVE OR BELOW THE FRAME?

ENTER (1=Above, 2=Below)= 1

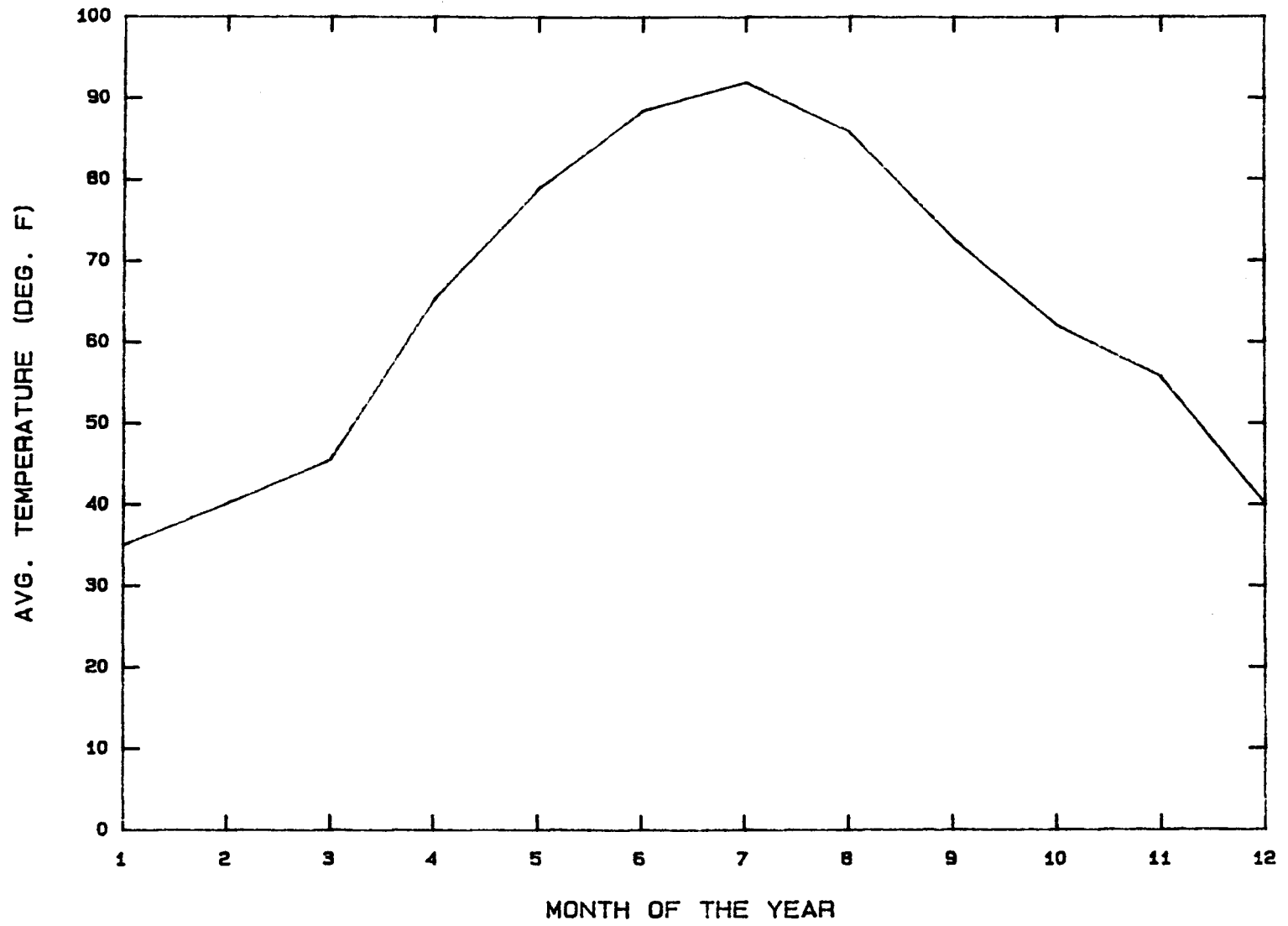
CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 7
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,4X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 2
STOP
)

DATA FOR EXAMPLES 1 - 5

1	35.0	33.5	36.8	31.0	34.7	38.8	36.0
2	40.2	41.5	43.6	39.8	40.8	45.2	42.4
3	45.6	44.7	47.2	46.6	45.8	45.9	47.3
4	65.3	65.7	66.4	63.6	63.8	65.8	63.9
5	78.9	80.0	81.6	79.9	78.7	81.2	80.9
6	88.5	87.6	90.0	90.6	88.5	87.5	88.8
7	92.0	91.5	90.6	93.6	94.0	92.8	91.8
8	85.8	84.7	86.9	88.4	84.9	84.8	84.6
9	72.7	69.9	69.5	70.0	71.6	72.1	71.7
10	62.0	61.9	65.6	63.8	62.9	66.5	64.9
11	55.7	54.4	57.9	56.9	55.6	54.9	53.5
12	40.0	41.7	42.6	39.6	40.1	39.9	38.8

COLUMN 1 - MONTH OF THE YEAR
COLUMN 2 - AVG. TEMPERATURE (DEG. F) 1971
COLUMN 3 - AVG. TEMPERATURE (DEG. F) 1972
COLUMN 4 - AVG. TEMPERATURE (DEG. F) 1973
COLUMN 5 - AVG. TEMPERATURE (DEG. F) 1974
COLUMN 6 - AVG. TEMPERATURE (DEG. F) 1975
COLUMN 7 - AVG. TEMPERATURE (DEG. F) 1976
COLUMN 8 - AVG. TEMPERATURE (DEG. F) 1977

EXAMPLE 1



EXAMPLE 2

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= DATA

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1

ENTER LENGTH OF X-AXIS (inches)= 7

ENTER LENGTH OF Y-AXIS (inches)= 5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1.5

ENTER # OF DIVISIONS OF X-AXIS= 11

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 12

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 1

ENTER TICK LABEL #2= 2

ENTER TICK LABEL #3= 3

ENTER TICK LABEL #4= 4

ENTER TICK LABEL #5= 5

ENTER TICK LABEL #6= 6

ENTER TICK LABEL #7= 7
ENTER TICK LABEL #8= 8
ENTER TICK LABEL #9= 9
ENTER TICK LABEL #10= 10
ENTER TICK LABEL #11= 11
ENTER TICK LABEL #12= 12
WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1
ENTER X-LABEL = MONTH OF THE YEAR
SET THE Y-AXIS
ENTER # OF TICKS TO BE LABELED= 11
ENTER # OF TICKS TO BE SKIPPED= 0
ENTER TICK LABEL #1= 0
ENTER TICK LABEL #2= 10
ENTER TICK LABEL #3= 20
ENTER TICK LABEL #4= 30
ENTER TICK LABEL #5= 40
ENTER TICK LABEL #6= 50
ENTER TICK LABEL #7= 60
ENTER TICK LABEL #8= 70
ENTER TICK LABEL #9= 80
ENTER TICK LABEL #10= 90
ENTER TICK LABEL #11= 100
WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1
ENTER Y-LABEL= AVG. TEMPERATURE (DEG. F)
WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1
ENTER THE TITLE= EXAMPLE 2
ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12
WANT THIS TITLE ABOVE OR BELOW THE FRAME?
ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 2
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,4X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER THE INPUT FILE NAME= DATA
DO YOU WANT PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 4
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,12X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER THE INPUT FILE NAME= DATA
DO YOU WANT PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 6
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,20X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 1
ENTER LOCATION OF STARTING POINT OF LEGEND IN INCHES
FROM THE LOWER LEFT CORNER OF FRAME (X1,Y1)= 4,1.5

ENTER # OF SENTENCES IN LEGEND= 3

ENTER SENTENCE# 1 OF THE LEGEND= 1971 TEMPERATURES

ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 2,1

ENTER SENTENCE# 2 OF THE LEGEND= 1972 TEMPERATURES

ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 4,1

ENTER SENTENCE# 3 OF THE LEGEND= 1973 TEMPERATURES

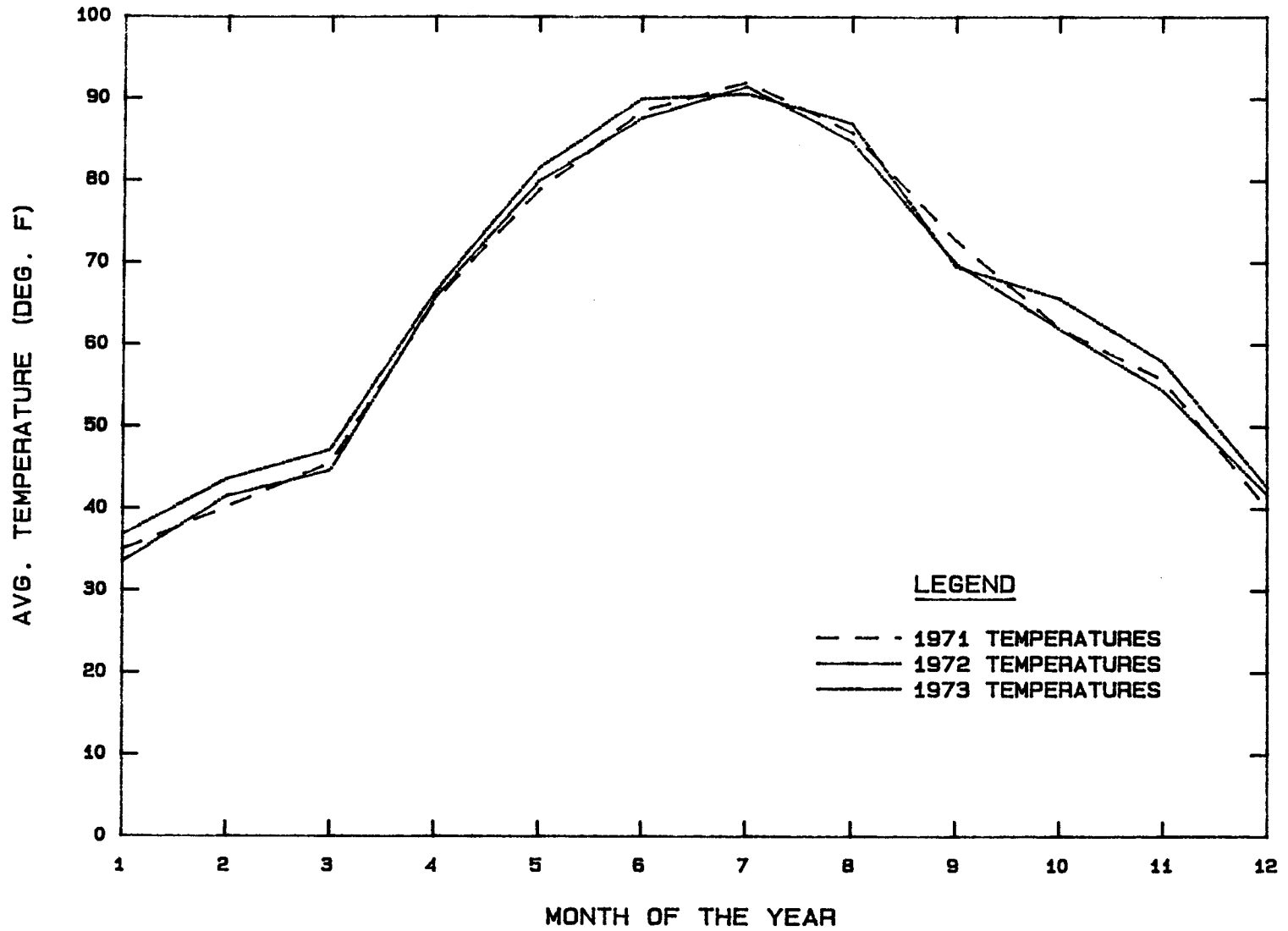
ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 6,1

WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)= :

STOP

)

EXAMPLE 2



EXAMPLE 3

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= DATA

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1

ENTER LENGTH OF X-AXIS (inches)= 7

ENTER LENGTH OF Y-AXIS (inches)= 5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1.5

ENTER # OF DIVISIONS OF X-AXIS= 11

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 2

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 12

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= JAN

ENTER TICK LABEL #2= FEB

ENTER TICK LABEL #3= MAR

ENTER TICK LABEL #4= APR

ENTER TICK LABEL #5= MAY

ENTER TICK LABEL #6= JUN

ENTER TICK LABEL #7= JUL

ENTER TICK LABEL #8= AUG

ENTER TICK LABEL #9= SEP

ENTER TICK LABEL #10= OCT

ENTER TICK LABEL #11= NOV

ENTER TICK LABEL #12= DEC

WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1

ENTER X-LABEL = MONTH OF THE YEAR

SET THE Y-AXIS

ENTER # OF TICKS TO BE LABELED= 11

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 0

ENTER TICK LABEL #2= 10

ENTER TICK LABEL #3= 20

ENTER TICK LABEL #4= 30

ENTER TICK LABEL #5= 40

ENTER TICK LABEL #6= 50

ENTER TICK LABEL #7= 60

ENTER TICK LABEL #8= 70

ENTER TICK LABEL #9= 80

ENTER TICK LABEL #10= 90

ENTER TICK LABEL #11= 100

WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1

ENTER Y-LABEL= AVG. TEMPERATURE (DEG. F)

WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1

ENTER THE TITLE= EXAMPLE 3

ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12

WANT THIS TITLE ABOVE OR BELOW THE FRAME?

ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1

SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1

ENTER INPUT FILE FORMAT IN PARENTHESES= (F2.0,4X,F4.1)

ENTER (XMIN,XMAX)= 1,12

ENTER (YMIN,YMAX)= 0,100

CHOOSE THE SYMBOL FROM THE FOLLOWING;

ENTER (10=*,20=+,30=x,50=CIRCLE,90=SQUARE,120=TRIANGLE)= 10

ENTER HEIGHT OF SYMBOL IN INCHES= .1

WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2

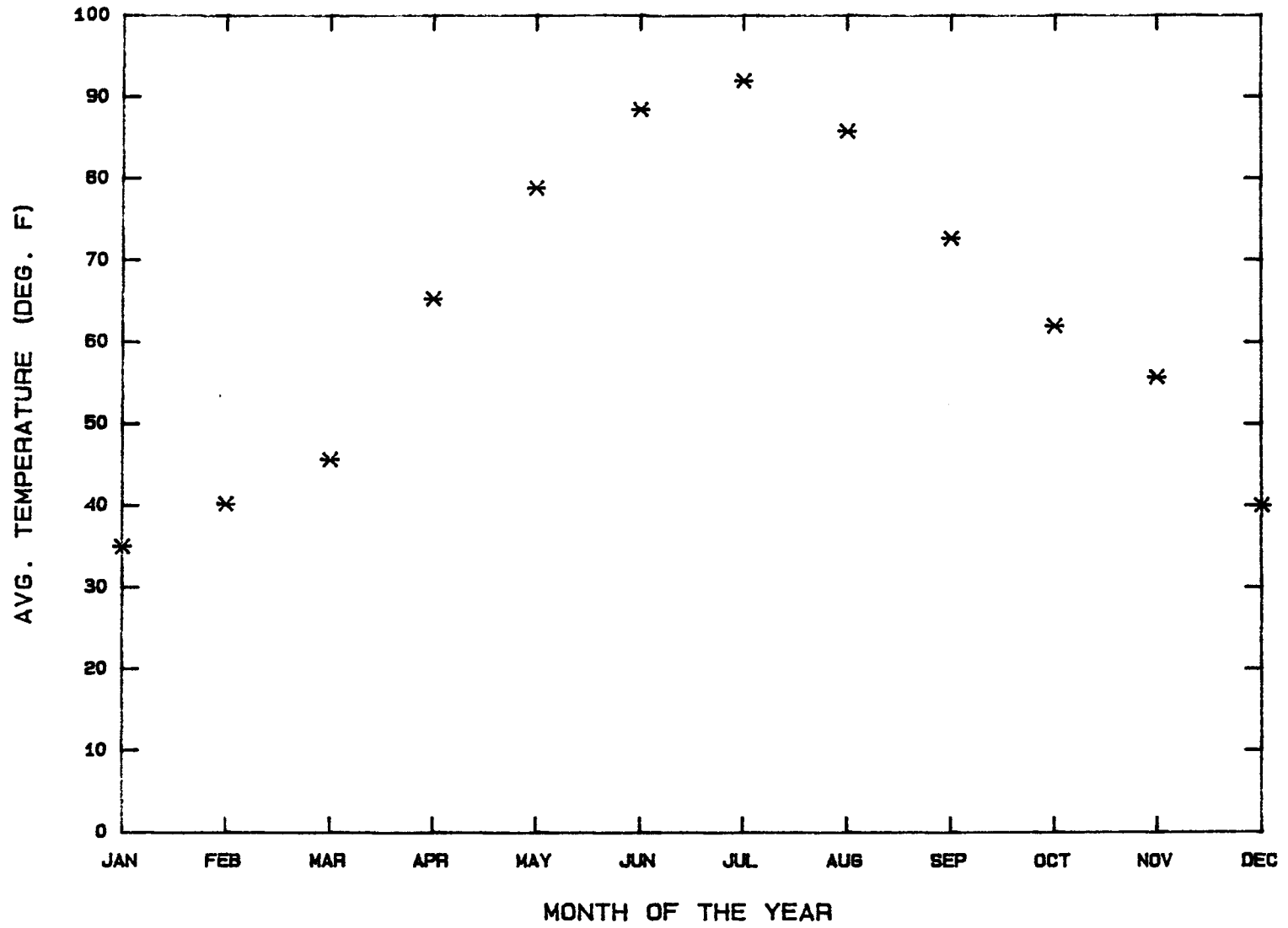
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 2

WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)= 2

STOP

)

EXAMPLE 3



EXAMPLE 4

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= DATA

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 2

ENTER LENGTH OF X-AXIS (inches)= 7

ENTER LENGTH OF Y-AXIS (inches)= 5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1.5

ENTER # OF DIVISIONS OF X-AXIS= 11

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 2

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 12

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 1

ENTER TICK LABEL #2= 2

ENTER TICK LABEL #3= 3

ENTER TICK LABEL #4= 4

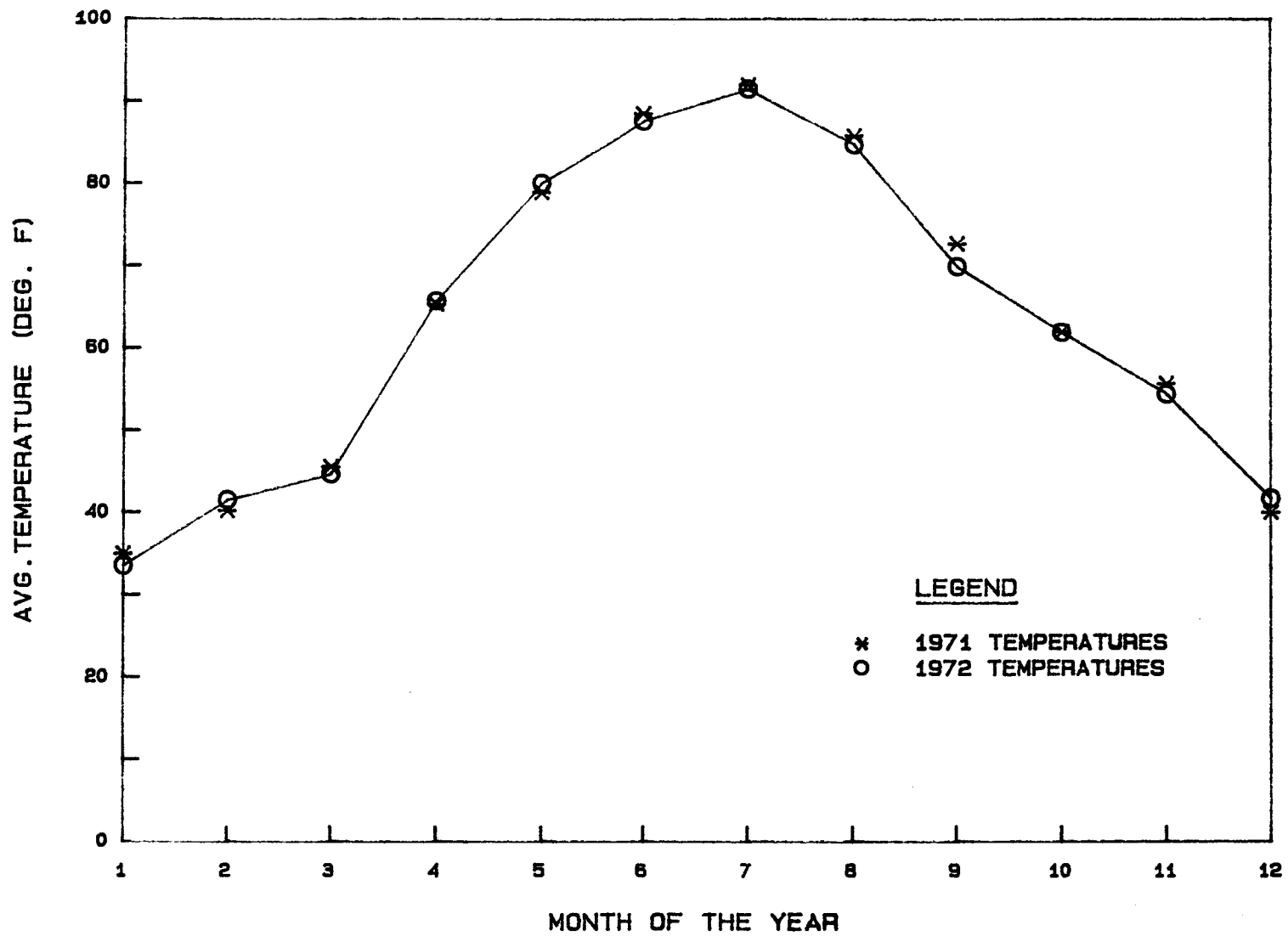
ENTER TICK LABEL #5= 5

ENTER TICK LABEL #6= 6

ENTER TICK LABEL #7= 7
ENTER TICK LABEL #8= 8
ENTER TICK LABEL #9= 9
ENTER TICK LABEL #10= 10
ENTER TICK LABEL #11= 11
ENTER TICK LABEL #12= 12
WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1
ENTER X-LABEL = MONTH OF THE YEAR
SET THE Y-AXIS
ENTER # OF TICKS TO BE LABELED= 11
ENTER # OF TICKS TO BE SKIPPED= 0
ENTER TICK LABEL #1= 0
ENTER TICK LABEL #2=
ENTER TICK LABEL #3= 20
ENTER TICK LABEL #4=
ENTER TICK LABEL #5= 40
ENTER TICK LABEL #6=
ENTER TICK LABEL #7= 60
ENTER TICK LABEL #8=
ENTER TICK LABEL #9= 80
ENTER TICK LABEL #10=
ENTER TICK LABEL #11= 100
WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1
ENTER Y-LABEL= AVG.TEMPERATURE (DEG. F)
WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1
ENTER THE TITLE= EXAMPLE 4
ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12
WANT THIS TITLE ABOVE OR BELOW THE FRAME?
ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER INPUT FILE FORMAT IN PARENTHESES= (F2.0,4X,F4.1)
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
CHOOSE THE SYMBOL FROM THE FOLLOWING;
ENTER (10=*,20=+,30=x,50=CIRCLE,90=SQUARE,120=TRIANGLE)= 10
ENTER HEIGHT OF SYMBOL IN INCHES= .1
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER THE INPUT FILE NAME= DATA
DO YOU WANT PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 3
ENTER INPUT FILE FORMAT IN PARENTHESES= (F2.0,12X,F4.1)
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 7
CHOOSE THE SYMBOL FROM THE FOLLOWING;
ENTER (10=*,20=+,30=x,50=CIRCLE,90=SQUARE,120=TRIANGLE)= 50
ENTER HEIGHT OF SYMBOL IN INCHES= .1
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 1
ENTER LOCATION OF STARTING POINT OF LEGEND IN INCHES
FROM THE LOWER LEFT CORNER OF FRAME (X1,Y1)= 4,1.5
ENTER # OF SENTENCES IN LEGEND= 2
ENTER SENTENCE# 1 OF THE LEGEND= 1971 TEMPERATURES
ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 10,1
ENTER SENTENCE# 2 OF THE LEGEND= 1972 TEMPERATURES
ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 50,1
WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)= 2

EXAMPLE 4



EXAMPLE 5

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= DATA

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1

ENTER LENGTH OF X-AXIS (inches)= 7

ENTER LENGTH OF Y-AXIS (inches)= 5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1.5

ENTER # OF DIVISIONS OF X-AXIS= 11

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 12

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 1

ENTER TICK LABEL #2= 2

ENTER TICK LABEL #3= 3

ENTER TICK LABEL #4= 4

ENTER TICK LABEL #5= 5

ENTER TICK LABEL #6= 6

ENTER TICK LABEL #7= 7

ENTER TICK LABEL #8= 8

ENTER TICK LABEL #9= 9

ENTER TICK LABEL #10= 10

ENTER TICK LABEL #11= 11

ENTER TICK LABEL #12= 12

WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1

ENTER X-LABEL = MONTH OF THE YEAR

SET THE Y-AXIS

ENTER # OF TICKS TO BE LABELED= 11

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 0

ENTER TICK LABEL #2= 10

ENTER TICK LABEL #3= 20

ENTER TICK LABEL #4= 30

ENTER TICK LABEL #5= 40

ENTER TICK LABEL #6= 50

ENTER TICK LABEL #7= 60

ENTER TICK LABEL #8= 70

ENTER TICK LABEL #9= 80

ENTER TICK LABEL #10= 90

ENTER TICK LABEL #11= 100

WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1

ENTER Y-LABEL= AVG. TEMPERATURE (DEG. F)

WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1

ENTER THE TITLE= EXAMPLE 5

ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12

WANT THIS TITLE ABOVE OR BELOW THE FRAME?

ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1

SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 7
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,4X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 2
ENTER THE INPUT FILE NAME= DATA
DO YOU WANT PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 3
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,12X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 4
ENTER THE INPUT FILE NAME= DATA
DO YOU WANT PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1
ENTER (XMIN,XMAX)= 1,12
ENTER (YMIN,YMAX)= 0,100
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 4
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (F2.0,20X,F4.1)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 1
ENTER LOCATION OF STARTING POINT OF LEGEND IN INCHES
FROM THE LOWER LEFT CORNER OF FRAME (X1,Y1)= 4,1.8
ENTER # OF SENTENCES IN LEGEND= 3

ENTER SENTENCE# 1 OF THE LEGEND= 1971 TEMPERATURES

ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 7,1

ENTER SENTENCE# 2 OF THE LEGEND= 1972 TEMPERATURES

ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 3,2

ENTER SENTENCE# 3 OF THE LEGEND= 1973 TEMPERATURES

ENTER (LINE TYPE OR SYMBOL CODE, PEN COLOR) FOR THIS
SENTENCE (See Line Types and Symbol codes on the plotter)= 4,4

WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)= 2

STOP
)

EXAMPLE 6

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= :SI22:GH.SCRATCH:MQ112

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 2

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 2

ENTER LENGTH OF X-AXIS (inches)= 5

ENTER LENGTH OF Y-AXIS (inches)= 7

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 1.5,1.5

ENTER # OF DIVISIONS OF X-AXIS= 5

ENTER # OF DIVISIONS OF Y-AXIS= 5

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 2

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 6

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 0.0

ENTER TICK LABEL #2= 0.1

ENTER TICK LABEL #3= 0.2

ENTER TICK LABEL #4= 0.3

ENTER TICK LABEL #5= 0.4

ENTER TICK LABEL #6= 0.5

WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1
ENTER X-LABEL = MOISTURE CONTENT
SET THE Y-AXIS
ENTER # OF TICKS TO BE LABELED= 6
ENTER # OF TICKS TO BE SKIPPED= 0
ENTER TICK LABEL #1= 0.01
ENTER TICK LABEL #2= 0.1
ENTER TICK LABEL #3= 1
ENTER TICK LABEL #4= 10
ENTER TICK LABEL #5= 100
ENTER TICK LABEL #6= 1000
WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1
ENTER Y-LABEL= HYDRAULIC CONDUCTIVITY (cm/day)
WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1
ENTER THE TITLE= EXAMPLE 6
ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12
WANT THIS TITLE ABOVE OR BELOW THE FRAME?
ENTER (1=Above, 2=Below)= 1
CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1
SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1
ENTER (XMIN,XMAX)= 0,0.5
ENTER (YMIN,YMAX)= 0.01,1000
ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 7
ENTER THE INPUT FILE FORMAT IN PARENTHESES= (2F12.6)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 2
WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)= ;
STOP
)

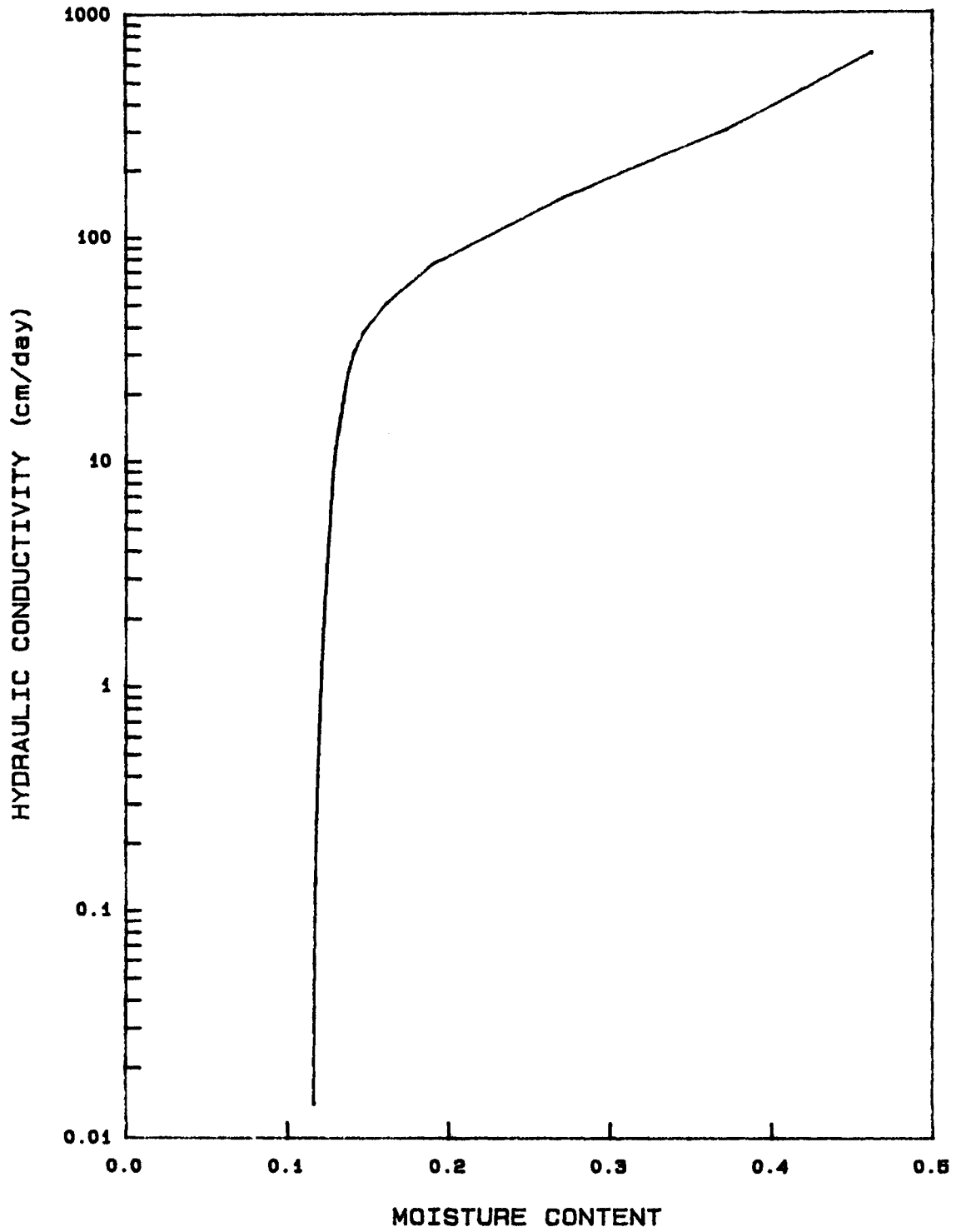
DATA FOR EXAMPLE 6

.116278	.014168
.116993	.058078
.117708	.134449
.118422	.246276
.119137	.396871
.119852	.589917
.120569	.829518
.121286	1.120252
.122001	1.467225
.122711	1.876152
.123417	2.353597
.124129	2.907313
.124860	3.546458
.125608	4.281429
.126341	5.122555
.127017	6.080559
.127616	7.168230
.128238	8.410840
.129035	9.847793
.130147	11.532717
.131548	13.516665
.133088	15.843899
.134615	18.564880
.136228	21.791168
.138370	25.767792
.141510	30.880966
.147378	38.174667
.161115	50.875610
.190386	76.492844
.270532	151.436523
.371820	304.904053
.462250	666.340088

COLUMN 1 - MOISTURE CONTENT

COLUMN 2 - HYDRAULIC CONDUCTIVITY (cm/day)

EXAMPLE 6



EXAMPLE 7

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 1

ENTER THE OUTPUT FILE NAME= PLOTOUT

ENTER THE INPUT FILE NAME= :SI22:GH.SCRATCH:MOIST1

ENTER XMOD (1=LINEAR, 2=LOG)= 1

ENTER YMOD (1=LINEAR, 2=LOG)= 1

TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1

ENTER LENGTH OF X-AXIS (inches)= 2

ENTER LENGTH OF Y-AXIS (inches)= 5.5

ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,1

ENTER # OF DIVISIONS OF X-AXIS= 5

ENTER # OF DIVISIONS OF Y-AXIS= 10

SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different pen colors displayed on the plotter)= 1

PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1

DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?

ENTER (1=LINE, 2=SYMBOLS, 3=BOTH)= 1

SET THE LABELS ON XY-AXES

ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07

ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09

SET THE X-AXIS

ENTER # OF TICKS TO BE LABELED= 6

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 0.0

ENTER TICK LABEL #2= 0.1

ENTER TICK LABEL #3= 0.2

ENTER TICK LABEL #4= 0.3

ENTER TICK LABEL #5= 0.4

ENTER TICK LABEL #6= 0.5

WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1

ENTER X-LABEL = MOISTURE CONTENT

SET THE Y-AXIS

ENTER # OF TICKS TO BE LABELED= 11

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 10

ENTER TICK LABEL #2= 9

ENTER TICK LABEL #3= 8

ENTER TICK LABEL #4= 7

ENTER TICK LABEL #5= 6

ENTER TICK LABEL #6= 5

ENTER TICK LABEL #7= 4

ENTER TICK LABEL #8= 3

ENTER TICK LABEL #9= 2

ENTER TICK LABEL #10= 1

ENTER TICK LABEL #11= 0

WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1

ENTER Y-LABEL= DEPTH (ft)

WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1

ENTER THE TITLE= JAN. 1, 1985

ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12

WANT THIS TITLE ABOVE OR BELOW THE FRAME?

ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1

SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1

ENTER (XMIN,XMAX)= 0,0.5

ENTER (YMIN,YMAX)= 10,0

ENTER THE TYPE OF LINE FROM 0 TO 7 (see different line types displayed on the plotter)= 7

ENTER THE INPUT FILE FORMAT IN PARENTHESES= (24X,F6.4,3X,F5.2)
WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2
WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 2
WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)=
ENTER THE INPUT FILE NAME= :SI22:GH.SCRATCH:MOIST2
ENTER XMOD (1=LINEAR, 2=LOG)= 1
ENTER YMOD (1=LINEAR, 2=LOG)= 1
TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1
ENTER LENGTH OF X-AXIS (inches)= 2
ENTER LENGTH OF Y-AXIS (inches)= 5.5
ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 6,1
ENTER # OF DIVISIONS OF X-AXIS= 5
ENTER # OF DIVISIONS OF Y-AXIS= 10
SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different
pen colors displayed on the plotter)= 1
PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 1
DO YOU WANT TO PLOT A LINE, SYMBOLS OR BOTH?
ENTER (1=LINE , 2=SYMBOLS, 3=BOTH)= 3
SET THE LABELS ON XY-AXES
ENTER THE SIZE OF TICK LABELS IN INCHES (Width, Height)= .05,.07
ENTER THE SIZE OF XY-LABELS IN INCHES (Width, Height)= .07,.09
SET THE X-AXIS
ENTER # OF TICKS TO BE LABELED= 6
ENTER # OF TICKS TO BE SKIPPED= 0
ENTER TICK LABEL #1= 0.0
ENTER TICK LABEL #2= 0.1
ENTER TICK LABEL #3= 0.2
ENTER TICK LABEL #4= 0.3
ENTER TICK LABEL #5= 0.4
ENTER TICK LABEL #6= 0.5
WANT TO LABEL X-AXIS? (1=YES, 2=NO)= 1

ENTER X-LABEL = MOISTURE CONTENT

SET THE Y-AXIS

ENTER # OF TICKS TO BE LABELED= 11

ENTER # OF TICKS TO BE SKIPPED= 0

ENTER TICK LABEL #1= 10

ENTER TICK LABEL #2= 9

ENTER TICK LABEL #3= 8

ENTER TICK LABEL #4= 7

ENTER TICK LABEL #5= 6

ENTER TICK LABEL #6= 5

ENTER TICK LABEL #7= 4

ENTER TICK LABEL #8= 3

ENTER TICK LABEL #9= 2

ENTER TICK LABEL #10= 1

ENTER TICK LABEL #11= 0

WANT TO LABEL Y-AXIS? (1=YES, 2=NO)= 1

ENTER Y-LABEL= DEPTH (ft)

WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1

ENTER THE TITLE= FEB. 2, 1985

ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12

WANT THIS TITLE ABOVE OR BELOW THE FRAME?

ENTER (1=Above, 2=Below)= 1

CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1

SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1

ENTER INPUT FILE FORMAT IN PARENTHESES= (24X,F6.4,3X,F5.2)

ENTER (XMIN,XMAX)= 0,0.5

ENTER (YMIN,YMAX)= 10,0

ENTER TYPE OF LINE FROM 0 TO 7 (see different line
types displayed on the plotter)= 7

CHOOSE THE SYMBOL FROM THE FOLLOWING;

ENTER (10=*,20=+,30=x,50=CIRCLE,90=SQUARE,120=TRIANGLE)= 90

ENTER HEIGHT OF SYMBOL IN INCHES= .08

WANT ANOTHER PLOT IN THE SAME FRAME? (1=YES, 2=NO)= 2

WANT TO WRITE LEGEND IN THIS FRAME? (1=YES, 2=NO)= 2

WANT ANOTHER PLOT ON THE SAME PAGE, BUT IN A DIFFERENT FRAME? (1=YES, 2=NO)=

STOP

)

DATA FOR LEFT HAND SIDE PLOT IN EXAMPLE 7

9	22	1985	.1029	.75	5497.00	3416.30
18	22	1985	.0818	1.50	4684.67	3416.30
27	22	1985	.1693	2.25	8056.00	3416.30
36	22	1985	.2219	3.00	10079.33	3416.30
45	22	1985	.1989	3.75	9194.67	3416.30
54	22	1985	.2002	4.50	9247.00	3416.30
63	22	1985	.2349	5.25	10580.33	3416.30
72	22	1985	.1855	6.00	8679.67	3416.30
81	22	1985	.1595	6.75	7677.00	3416.30
90	22	1985	.1899	7.50	8847.67	3416.30
99	22	1985	.2704	8.25	11951.00	3416.30

DATA FOR RIGHT HAND SIDE PLOT IN EXAMPLE 7

9	8	1985	.0706	.75	4281.00	3440.00
18	8	1985	.0765	1.50	4509.67	3440.00
27	8	1985	.1894	2.25	8889.00	3440.00
36	8	1985	.2079	3.00	9608.33	3440.00
45	8	1985	.2054	3.75	9512.67	3440.00
54	8	1985	.1820	4.50	8603.00	3440.00
63	8	1985	.2097	5.25	9678.00	3440.00
72	8	1985	.1742	6.00	8300.00	3440.00
81	8	1985	.1253	6.75	6403.67	3440.00
90	8	1985	.1718	7.50	8207.00	3440.00
99	8	1985	.2711	8.25	12059.00	3440.00

ONLY COLUMNS 4 AND 5 WERE USED.

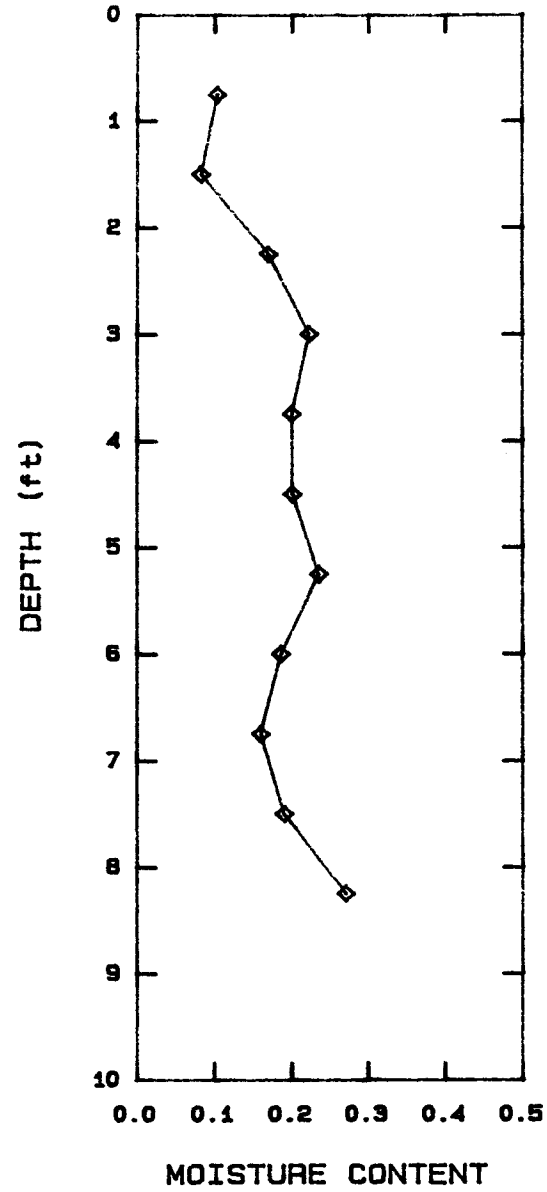
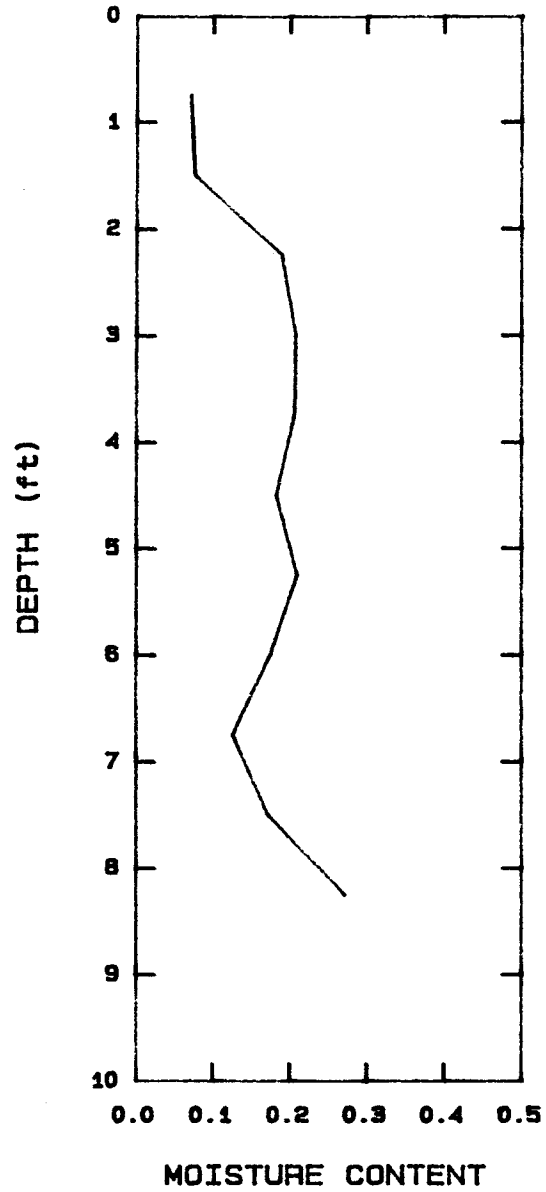
COLUMN 4 - MOISTURE CONTENT

COLUMN 5 - DEPTH (ft)

EXAMPLE 7

JAN. 1, 1985

FEB. 2, 1985



EXAMPLE 8

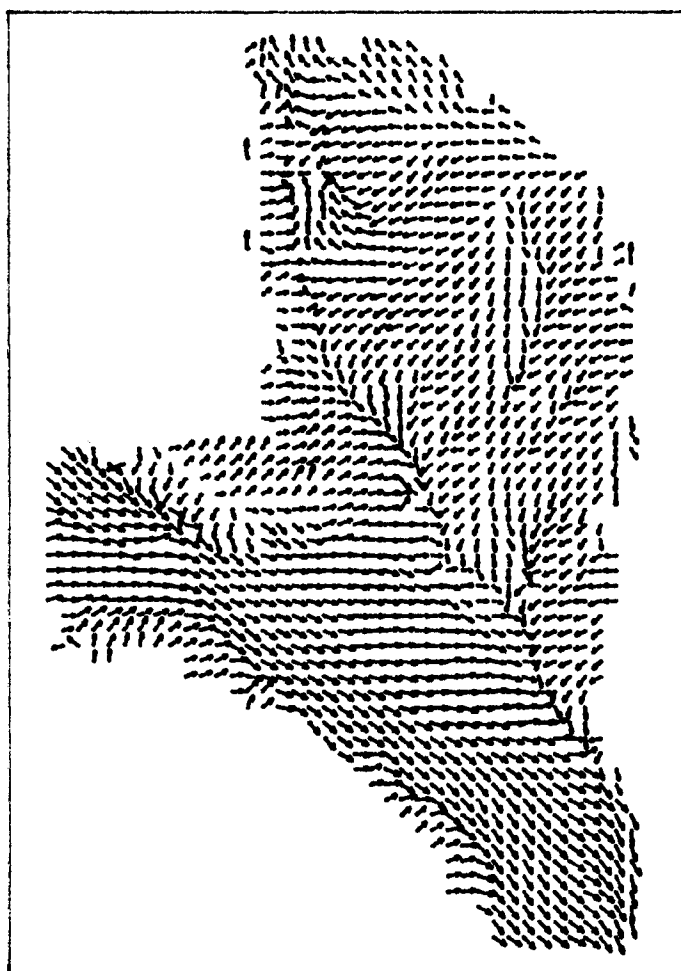
```
) X PROG PLOT
SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4
WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 2
ENTER THE INPUT DATA FILE NAME= :SI22:GH.SCRATCH:1980.SIM.VEL
ENTER THE OUTPUT FILE NAME= PLOTOUT8
ENTER XMOD (1=LINEAR, 2=LOG)= 1
ENTER YMOD (1=LINEAR, 2=LOG)= 1
TICK MARKS ON AXES? (ENTER 1=ALL AXES, 2=TWO AXES)= 1
ENTER LENGTH OF X-AXIS (inches)= 3.5
ENTER LENGTH OF Y-AXIS (inches)= 5
ENTER (X0,Y0 i.e., MARGINS FROM LOWER LEFT CORNER OF PAPER IN INCHES)= 2,2
ENTER # OF DIVISIONS OF X-AXIS= 1
ENTER # OF DIVISIONS OF Y-AXIS= 1
SELECT PEN COLOR FOR FRAME FROM 1 TO 6 (see different
pen colors displayed on the plotter)= 1
PAPER - HORZ. OR VERT.? (1=HORZ, 2=VERT)= 2
ENTER INPUT FILE FORMAT IN PARENTHESES (4 VARIABLES)= (4E15.5)
ENTER (XMIN,XMAX)= 0,7
ENTER (YMIN,YMAX)= 0,10
WANT TO WRITE A TITLE? (1=YES, 2=NO)= 1
ENTER THE TITLE= EXAMPLE 8 - 1980 VELOCITY VECTORS
ENTER THE SIZE OF TITLE IN INCHES (Width,Height)= .1,.12
WANT THIS TITLE ABOVE OR BELOW THE FRAME?
ENTER (1=Above, 2=Below)= 2
CHOOSE PEN COLOR FOR TITLE (1 TO 6)= 1
WANT VECTORS OF DIFFERENT OR SAME COLOR? (1=SAME, 2=DIFFERENT)= 1
STOP
)
```

PARTIAL DATA FOR EXAMPLE 8

.50000E+01	.39683E+00	.51207E+01	.32138E+00
.51587E+01	.39683E+00	.52780E+01	.31462E+00
.53174E+01	.39683E+00	.54170E+01	.28981E+00
.54762E+01	.39683E+00	.55861E+01	.30343E+00
.56349E+01	.39683E+00	.57660E+01	.30504E+00
.57936E+01	.39683E+00	.59414E+01	.32197E+00
.59524E+01	.39683E+00	.60916E+01	.29521E+00
.61111E+01	.39683E+00	.62106E+01	.25493E+00
.62698E+01	.39683E+00	.63410E+01	.24031E+00
.50000E+01	.55556E+00	.50917E+01	.44366E+00
.51587E+01	.55556E+00	.52526E+01	.44472E+00
.53174E+01	.55556E+00	.54084E+01	.43982E+00
.54762E+01	.55556E+00	.55802E+01	.45149E+00
.56349E+01	.55556E+00	.57543E+01	.44736E+00

COLUMN 1 - X0
COLUMN 2 - Y0
COLUMN 3 - X1
COLUMN 4 - Y1





EXAMPLE 8 - 1980 VELOCITY VECTORS

EXAMPLE 9

) X PROG PLOT

SELECT THE PAPER SIZE (ENTER 1=LARGE, 4=SMALL)= 4

WANT XY PLOT, VECTOR PLOT OR TEXT? (1=XY PLOT, 2=VECTOR PLOT, 3=TEXT)= 3

ENTER THE TEXT FILE NAME= TEXTFILE

ENTER THE OUTPUT FILE NAME= PLOTOUT

PAPER - HORZ. OR VERT.? (ENTER 1=HORZ., 2=VERT.)= 2

ENTER XD,YD (i.e., distance in inches from lower left corner of paper)= .1,7

SELECT PEN COLOR FOR THIS PLOT (1 TO 6)= 1

SELECT PEN VELOCITY (Enter any number from 1 to 38, select
a small number for transparencies)= 38

ENTER SIZE OF LETTERS IN INCHES (width,height)= .06,.075

STOP

)

TEXT FILE FOR EXAMPLE 9

EXAMPLE 9

This package has the ability of plotting XY-data, vectors or writing a text. Different pen colors, symbols and line patterns are also available to distinguish multiple data sets on the same plot. The user is given a choice of changing the size of symbols and letters at various stages during the interactive computer friendly session.