

Getting Started with JMP[®]

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Technical Questions, Getting Started, Tutorials, Mentoring...

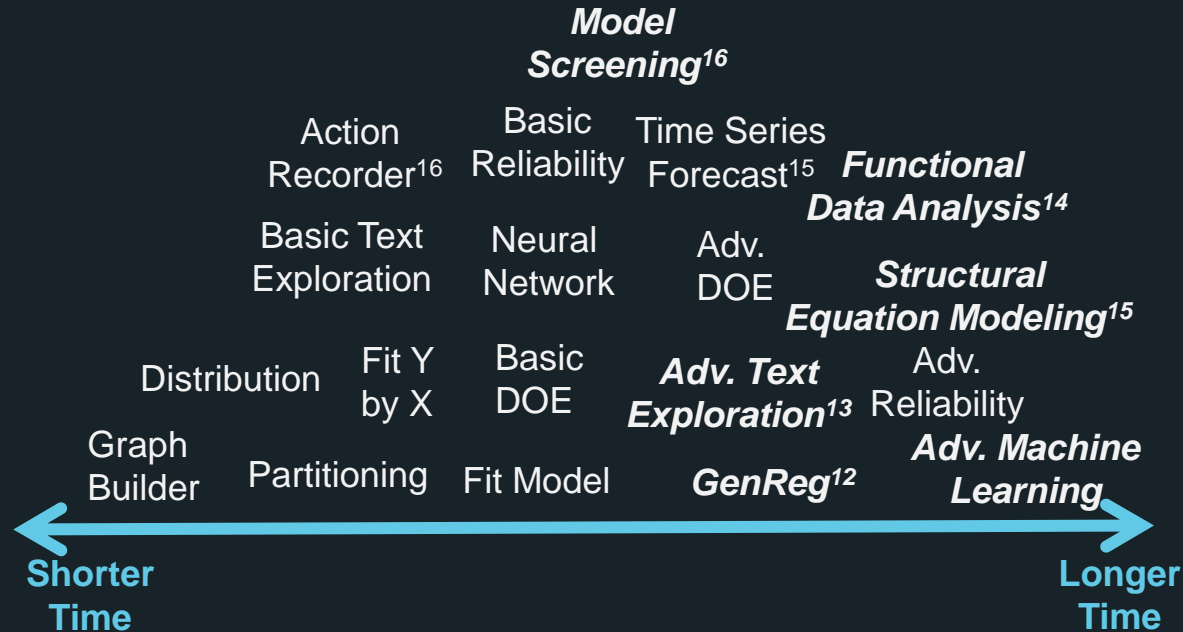
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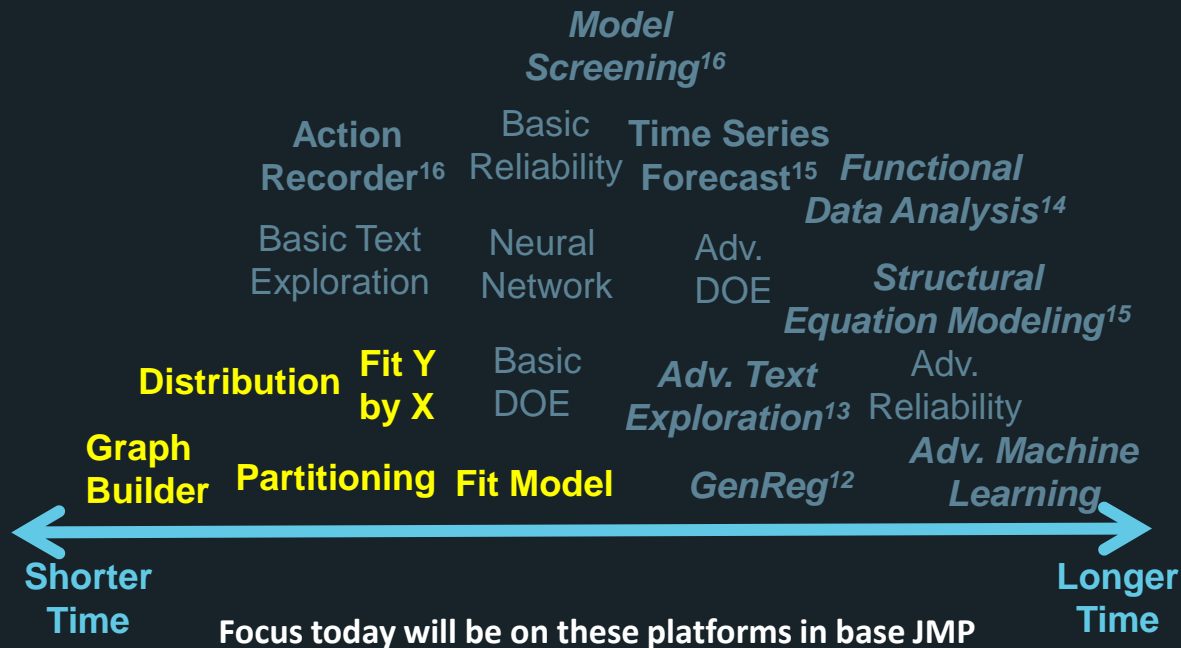
302-489-9291

How long does it take to learn JMP? Depends... on your level of statistical know how



- ***Bold & Italicized items are JMP Pro***
- Superscript is version release

How long does it take to learn JMP? Depends... on your level of statistical know how





› Getting Started with JMP

Explore resources designed to help you quickly learn the basics of JMP right from your desk.



› Mastering JMP

A webinar series for JMP users of all experience levels who want to build their analytic skills.



› New User Welcome Kit

You just got JMP. Now get ready to explore your data by following our learning road map.



› Statistical Thinking Course

Learn practical skills in this free online statistics course encompassing short videos, demonstrations, exercises and more.



› JMP Training from SAS

We offer courses at all levels to help build your knowledge and skill set.

OTHER RESOURCES

- › Books and JMP
- › Case Study Library
- › On-Demand Webinars for JMP Users
- › Statistics Knowledge Portal
- › JMP Blogs
- › Learning Library

www.jmp.com/mastering

Mastering JMP®

WEBINARS THAT EXPAND YOUR ANALYTIC SKILLS

Overview

Application Areas ^

Level v

Upcoming Live Webinars

All Application Areas

Design of Experiments

Quality Engineering, Reliability and Six Sigma

Statistics, Predictive Modeling and Data Mining

Data Visualization and Exploratory Data Analysis

Consumer and Market Research

Dashboard Building

Application Development

Life Sciences

You never
very few

-C.S. Lewis

Mastering JMP
analytic challenge

Our Systems
those you may
and how the
view the demo video and download the JMP Journals and files to try the techniques yourself.

Mastering JMP®

Overview

Application Areas v

Level v

Upcoming Live Webinars

Data Visualization and Exploratory Data Analysis

BASIC

Organizing and Getting the Most from JMP® Tables

> BASIC

Preparing Data for Analysis

> BASIC

Exploratory Data Analysis and Dynamic Graphs

> BASIC

Basics for Using Graph Builder

> BASIC

Using Geographic Maps

www.jmp.com/mastering

Mastering JMP®

WEBINARS THAT EXPAND YOUR ANALYTIC SKILLS

Overview Application Areas Level Upcoming Live Webinars

All Levels
Basic
Intermediate
Advanced

You never know what you can do if you try, and very few try unless they have a reason.

-C.S. Lewis

Mastering JMP is for people with specific business, research or academic analytic challenges who want to learn how to tackle them using JMP.

Our Systems Engineers give live webinar demos using case studies similar to those you may encounter. Ask questions during the webinar to help clarify if and how the techniques may apply to your situation. Then, after the live demo, view the demo video and download the JMP Journals and files to try the techniques yourself.

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Mastering JMP®

Overview Application Areas Level Upcoming Live Webinars

Intermediate

- > DESIGN OF EXPERIMENTS
Designing Mixture Experiments - Part 2
- > DATA VISUALIZATION AND EXPLORATORY DATA ANALYSIS
New in JMP® 14 and JMP® Pro 14
- > DATA VISUALIZATION AND EXPLORATORY DATA ANALYSIS
New in JMP® 15 and JMP® Pro 15
- > DATA VISUALIZATION AND EXPLORATORY DATA ANALYSIS
New in JMP® 16 and JMP Pro® 16



EVENTS

› Upcoming Live Events

› Live Webinars

› On-Demand Webinars

› Conferences

› Users Groups



› Statistically Speaking

Virtual keynote and panel conversations showcasing innovative organizations and their use of cutting-edge statistics.



› Discovery Summit

Online conferences for exploring data and inspiring innovation. For JMP users and analytic experts.

JMP Events

Live Webinars, Conferences, and more.

All Events Live Webinars Conferences

How to Model Complex, High-Dimensional Chemical Spectra

May 4 | 9:00 a.m. ET

> LIVE WEBINAR | BEYOND SPREADSHEETS

Session 1: Accessing Data | Beyond Spreadsheets Part 1: Breaking Away from Spreadsheets

May 4 | 1:00 p.m. ET

> LIVE WEBINAR | JMP IN THE UPSTREAM

Visualizing and Predicting Pore Pressure in Deepwater Gulf of Mexico

May 5 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

May 6 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Building Dashboards to Access and Share Updated Analyses

May 6 | 2:00 p.m. ET

> LIVE WEBINAR | SEMICONDUCTOR WEBINAR SERIES

Explore Your Data with Wafer Maps & Dynamic Visualization

May 10 | 12:00 p.m. ET

> LIVE WEBINAR | BEYOND SPREADSHEETS

Session 2: Data Preparation | Beyond Spreadsheets Part 1: Breaking Away from Spreadsheets

May 11 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Generating Summary Statistics Using Tabulate

May 13 | 2:00 p.m. ET

> LIVE WEBINAR | SEMICONDUCTOR WEBINAR SERIES

Semiconductor Quality Fundamentals

May 17 | 12:00 p.m. ET

> LIVE WEBINAR | BEYOND SPREADSHEETS

Session 3: Data Visualization | Beyond Spreadsheets Part 1: Breaking Away from Spreadsheets

May 18 | 1:00 p.m. ET

> LIVE WEBINAR | STATISTICALLY SPEAKING

Revolutionizing Sustainability Through Green Chemistry

May 19 | 1:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

May 20 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Identifying the Impact Curved Factor Shapes have on Responses

May 20 | 2:00 p.m. ET

> LIVE WEBINAR | SEMICONDUCTOR WEBINAR SERIES

Why Use Machine Learning and Predictive Modeling in Semiconductor?

May 24 | 12:00 p.m. ET

> LIVE WEBINAR | BEYOND SPREADSHEETS

Session 4: Basic Analysis and Modeling | Beyond Spreadsheets Part 1: Breaking Away from Spreadsheets

May 25 | 1:00 p.m. ET

> LIVE WEBINAR | SEMICONDUCTOR WEBINAR SERIES

JSL (JMP Scripting Language) for Semiconductor

May 31 | 12:00 p.m. ET

> LIVE WEBINAR | BEYOND SPREADSHEETS

Session 5: Sharing Results | Beyond Spreadsheets Part 1: Breaking Away from Spreadsheets

June 1 | 1:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

June 3 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Analyzing, Improving and Controlling Process Stability and Quality

June 3 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

June 10 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Retrieving and Organizing Text for Analysis

June 10 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

June 17 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Saving and Sharing JMP Reports and Graphs

June 17 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

June 24 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Identifying Important Variables in Your Data

June 24 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

July 8 | 1:00 p.m. ET

> LIVE WEBINAR | MASTERING JMP

Using Geographic Maps

July 8 | 2:00 p.m. ET

> LIVE WEBINAR

Getting Started With JMP

July 15 | 1:00 p.m. ET

www.jmp.com/en_us/events.html#live-webinars

EVENTS

- > Upcoming Live Events
- > Live Webinars
- > On-Demand Webinars



ANALYTICALLY SPEAKING
Make Statistical
Thinking Your
Strategy for Solving
Problems



EXPLORERS
Make Your
Experiments Count:
DOE Expert Bradley
Jones



ANALYTICALLY SPEAKING
The Elements of
Sophisticated
Reliability Analysis



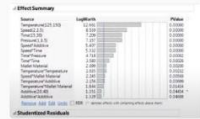
ANALYTICALLY SPEAKING
The Judgment Calls
We Make in
Dashboard Design



ANALYTICALLY SPEAKING
The Key to Good
Graphs



ANALYTICALLY SPEAKING
Mission-Oriented
Analytics: New
Methods for the
Intelligence
Community



TECHNICALLY SPEAKING
Model Selection for
Designed
Experiments



ANALYTICALLY SPEAKING
The Power of
Crowdsourcing Data
Science Ideas



ANALYTICALLY SPEAKING
The Science of Luck



ANALYTICALLY SPEAKING
To Explain or
Predict? That Is the
Question

Examples

- Import from Excel, *Revenue by Territory* data (also Database, Internet, PDF)
- Images in data tables, images as markers – *LMI-images* data
- Data on Maps – Animate over time – Save as GIF – *1997-1999 SST* data
- EDA – *Tablet Production* data – Distribution, Linking, Model, Test Prediction
- Visual Modeling – *Fitness* data, AND if time, *250factors 5sig 10K rows* data
- Tips along the way:
 - broadcast commands
 - color or mark by column
 - save selection to column
 - select dominant
 - drag labels
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 - animation – save as GIF
 - use column as marker
 - right-click transform column
 - transform axes

The JMP Data Table




- Unlike Excel, the JMP data table is **column centric** instead of **cell centric**
- Three panels on left hand side
 - **Table (Students)** – place to save run analyses – saved as JSL scripts
 - **Columns** – easy to reorder, rename, group, hide, label, or double-click to bring data into view
 - **Rows** – Double-click to select: *All rows*, *Excluded*, *Hidden* or *Labeled*, or, to deselect: *Selected*

The screenshot shows the JMP Pro interface with the following annotations:

- Hide or show the table panels**: Points to the top-left corner of the interface.
- Hide or show the data grid**: Points to the top-right corner of the interface.
- Hide or show Distributions**: Points to the distribution plots in the 'Table Options' panel.
- Table Options**: Points to the 'Students' table name and the distribution plots.
- Saved Scripts**: Points to the 'Distribution: Age and Sex' and 'Distribution: Height and Weight' entries.
- Column Options**: Points to the 'Columns (5/0)' panel.
- Row Options**: Points to the 'Rows' panel.
- Click & drag to adjust height & width of panels**: Points to the vertical and horizontal dividers between the left-hand panels.




age	sex	height	weight	idnum
11	M	72	196	327
12	F			628
13				979
14				999
15				25
16		51	51	196 ...
1	11 F	56	85	874
2	11 F	57	69	31
3	11 F	54	69	613
4	11 F	62	104	814
5	11 F	51	51	628
6	11 F	62	85	895
7	11 F	54	81	421
8	11 F	58	96	651
9	11 F	53	64	238
10	11 F	56	84	327
11				

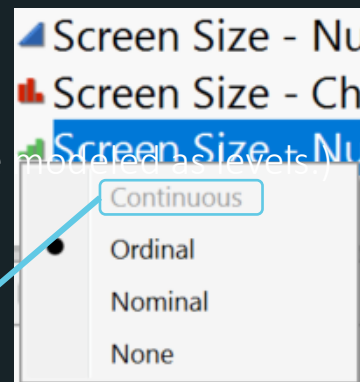
Key Points about JMP Data Table Columns

- Analyses and graphs offered in JMP depend on the attributes of the data
 - Numeric** vs. **Character** (clue to *Data Type* – look at justification in columns)
 - Continuous** , **Ordinal** , or **Nominal**  (*Modeling Type* is indicated by icon)
- Sometimes **numeric** values are really **nominal**. (They are just names & should be modeled as levels.)
 - Phone Numbers, SSNs, Part Numbers, Invoice Numbers, P.O. Numbers, etc.
 - We don't calculate means and standard deviations of these “numbers”
 - We don't plot or fit Phone Number vs. SSN, or Part Number vs. Invoice Number

	Numeric	Character	Screen Size - Numeric (Right Justified)	Screen Size - Character (Left Justified)	Screen Size - Number as Character (Left Justified)
1	Continuous		3	Three	3
2	Ordinal	Ordinal	4	Four	4
3	Nominal	Nominal	5	Five	5
4				• Six	

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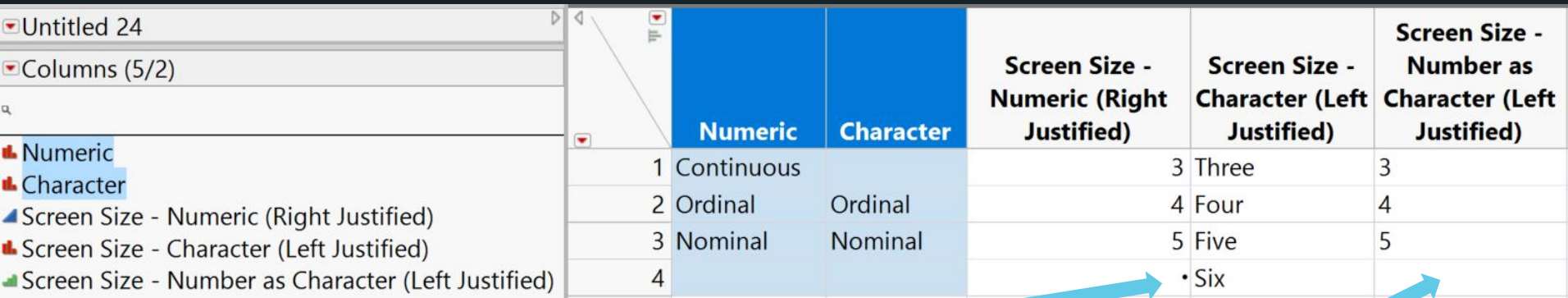


			Screen Size - Numeric (Right Justified)	Screen Size - Character (Left Justified)	Screen Size - Number as Character (Left Justified)
	Numeric	Character			
1	Continuous	<input type="text"/>	3	Three	3
2	Ordinal	Ordinal	4	Four	4
3	Nominal	Nominal	5	Five	5
4			• Six		

NOTE: Continuous modeling type is “greyed out” for Character data type

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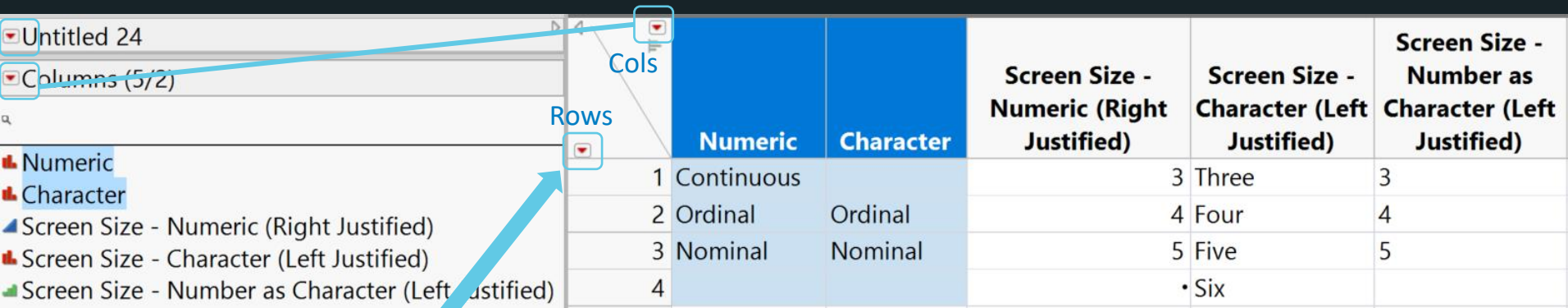


	Numeric	Character	Screen Size - Numeric (Right Justified)	Screen Size - Character (Left Justified)	Screen Size - Number as Character (Left Justified)
1	Continuous		3	Three	3
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NOTE: Missing Numeric has **dot** in cell & Missing Character is **blank**

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4				• Six	

NOTE: Contextual “Red Triangle” Menus, aka “Hotspots” – JMP unfolds itself offering options when needed

Key Points about JMP Data Table Columns

- Analyses and graphs offered in JMP depend on the role of the data (e.g. Numeric vs. Character vs. Nominal vs. Ordinal)
- Some columns are really factors (e.g. Invoice Number) and should be modeled as levels.

Cols	Rows
1	1
2	2
3	3
4	4

- of the data (e.g. Invoice Number)
- in columns)
- ated by icon)
- ames & should be modeled as levels.)
- umbers, etc.
- umbers”
- Invoice Number

Screen Size - Numeric (Right Justified)	Screen Size - Character (Left Justified)	Screen Size - Number as Character (Left Justified)
3	Three	3
4	Four	4
5	Five	5
	• Six	

NOTE: Conte

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Local Data Filter

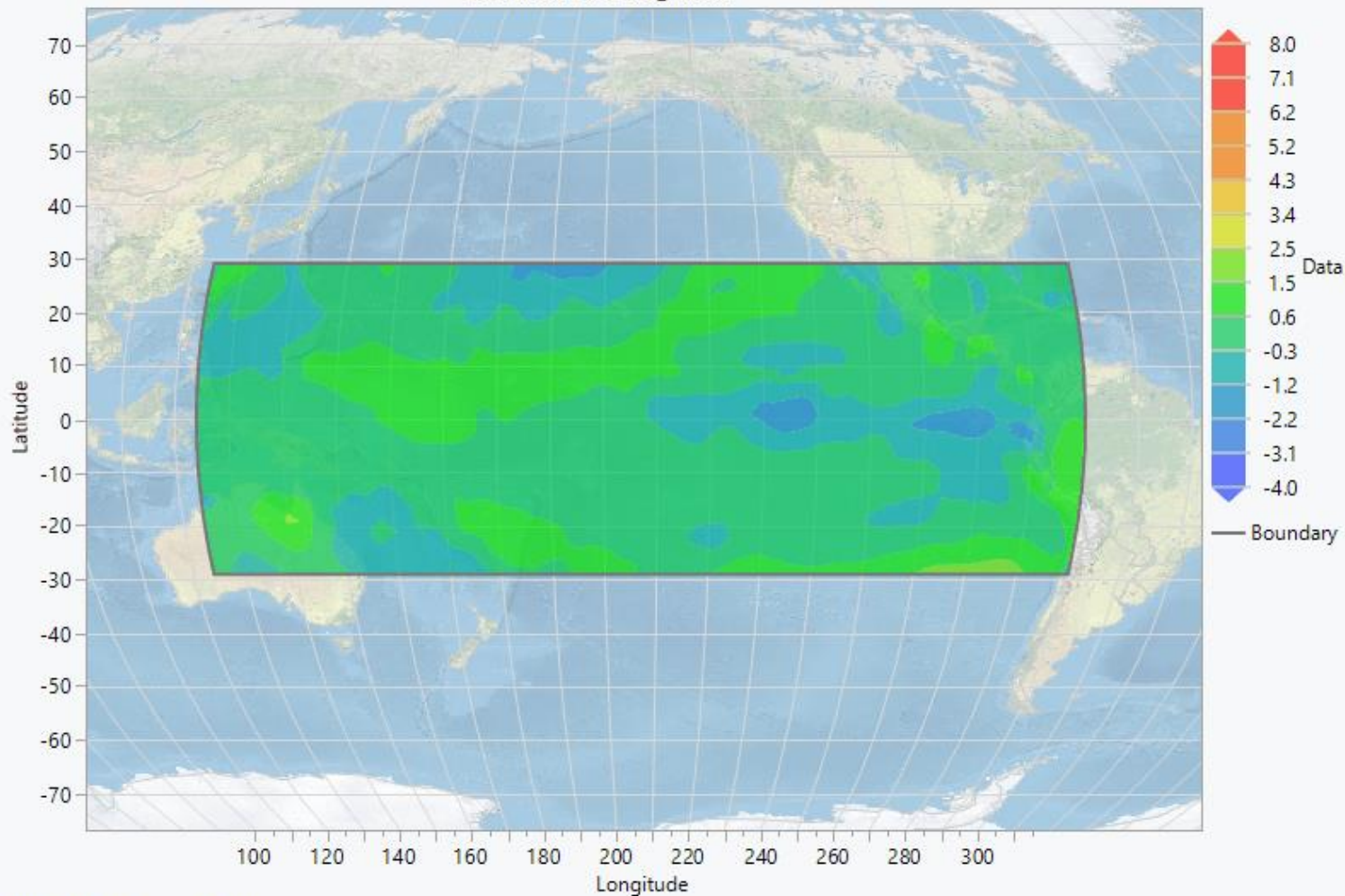
2520 matching rows

Inverse

Date m/y (36)

01/1997	2520
02/1997	2520
03/1997	2520
04/1997	2520
05/1997	2520
06/1997	2520
07/1997	2520
08/1997	2520
09/1997	2520
10/1997	2520
11/1997	2520
12/1997	2520
01/1998	2520
02/1998	2520
03/1998	2520
04/1998	2520
05/1998	2520
06/1998	2520

Latitude vs. Longitude



Where(Date m/y = 01/1997)

Questions?

<https://community.jmp.com/>



Discussions

Solve problems and share tips & tricks with other JMP users.



File Exchange

Download and share JMP add-ins, scripts, and sample data.



JMP Blogs

Read about a broad range of data analysis topics and posts that inform your JMP use.



Learn JMP

Extend your JMP skills with on-demand videos and JMP files.



JMP Wish List

We want to hear your ideas for improving JMP. Share them here.



JSL Cookbook

Building blocks of JSL code to reduce your coding workload.



JMP Users Groups

Meet up and discuss with other JMP users near you.



Discovery Summit

Info on upcoming Summits and materials from past events.



Community Help

Help with getting started, finding things, and how the Community works.

The JMP® Analytic Workflow

From data to insight – all in one self-service platform

Data

- Files
- Docs
- Webpages
- Databases
- Web APIs
- Cloud Sources
- Open Source Languages
- 3rd Party Files

Analytic Capabilities



Shareable Insights

- JMP Live
- HTML
- Business Docs
- Images

▶ See the JMP workflow in action (16:28)

https://www.jmp.com/en_us/software/analytic-workflow.html

Thanks for attending today.

Hope to see you for Session #2 on
**Importing, Consolidating, and
Maximizing the Value of Excel Data**

And for Session #3 on
Powerful Tools for Data Management

Good luck using JMP.



jmp.com

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