

Slide 1: Data Models Part 1: Thinking about Your Data

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EXTENSION

Slide 2: Learning Objectives

Learning Objectives

Explain why thinking before coding is important

Explain why it is important to understand how the data in a database relates to one another

Describe what a database is

Slide 3: Think Before You Code

Think Before You Code

What is the **problem** you are
trying to **solve**?

Slide 4: Understand Your Data

Understand Your Data

Understand the **business process** or **subject matter** the data is modeled after

Know the **business rules**

Understand how your data is **organized** and **structured** in the table (modeled)

Slide 5: Why This is Worthwhile

Why This is Worthwhile

Get more **accurate** results

Speed up your work

Have less **rework**

Slide 6: Databases and Tables

Databases and Tables

Database: A container (usually a file or set of files) to store organized data; a set of related information



Tables: A structured list of data or a specific type



Slide 7: Columns and Rows

Columns and Rows

Column: A single field in a table - all tables are made up of one or more columns

Row: A record in a table

	A	B	C	D	E	F	G	H	I	J	K
1	sku	name	brand	Price	item_height	item_length	item_width	item_unit_o	item_weight	item_unit_weight	
2	PFI-F0314BPY	Pfister F-031-4	Pfister	129.99	3.8	20.6	12.7 inches		6.5 pounds		
3	PFI-F042HAKQ	Pfister Amher	Pfister	79.99	7.69	4.81	6.56 inches		3.42 pounds		
4	PFI-FWK1340S	Pfister F-WK1-	Pfister	119.99	2.5	18.5	10 inches		5.12 pounds		
5	PFI-GT343TCG	Pfister GT34-3	Pfister	149.99	2.5	18.5	10 inches		6.2 pounds		
6	PFI-MP8LNKK	Pfister Langstr	Pfister	99.99	7.67	14.22	7.67 inches		3.2 pounds		
7	B0084QEP0U	Pfister GT529-	Pfister	109.99	2.5	18.5	10 inches		3.17 pounds		
8	PFI-GT529DCG	Pfister GT529-	Pfister	179.99	2.5	24.5	10.5 inches		3.17 pounds		
9	PFI-GT529DSS	Pfister GT529-	Pfister	114.99	2.5	24.5	10.5 inches		3.17 pounds		
10	B007LEP02Q	Pfister F-031-4	Pfister	249.99	4.1	20.6	12.8 inches		6.5 pounds		
11	PFI-F0314BPS	Pfister F-031-4	Pfister	144.99	4.1	20.6	12.8 inches		6.5 pounds		
12											