





Getting the Best Deal For The Customer

Robert McCullough
Managing Partner
McCullough Research

Buying and Selling Electricity In The West
January 16 and 17, 1997

Pigs Yes; Hippos No!



Getting The Best Deal

- Meeting The Customer
- Defining The Product
- Enabling Open Access
- Choosing The Tools
- Getting Acquainted
- Driving To A Resolution



Meeting The Customer

- **Ninety Years of Supplier Indifference**
- **Risk**
- **Time Horizons**
- **Economic Leverage**



Ninety Years of Supplier Indifference

- Our founder, Sam Insull, designed the economics and finances of the electric and gas industry to eliminate negotiation and salesmanship
- After 90 years, most utilities still only have the faintest sense of who their customers are
- We have had the experience where a utility doesn't even know the name or location of its major customers
- This is a tough problem for both the customer and the utility -- many customers simply cannot believe how low a priority customers can have

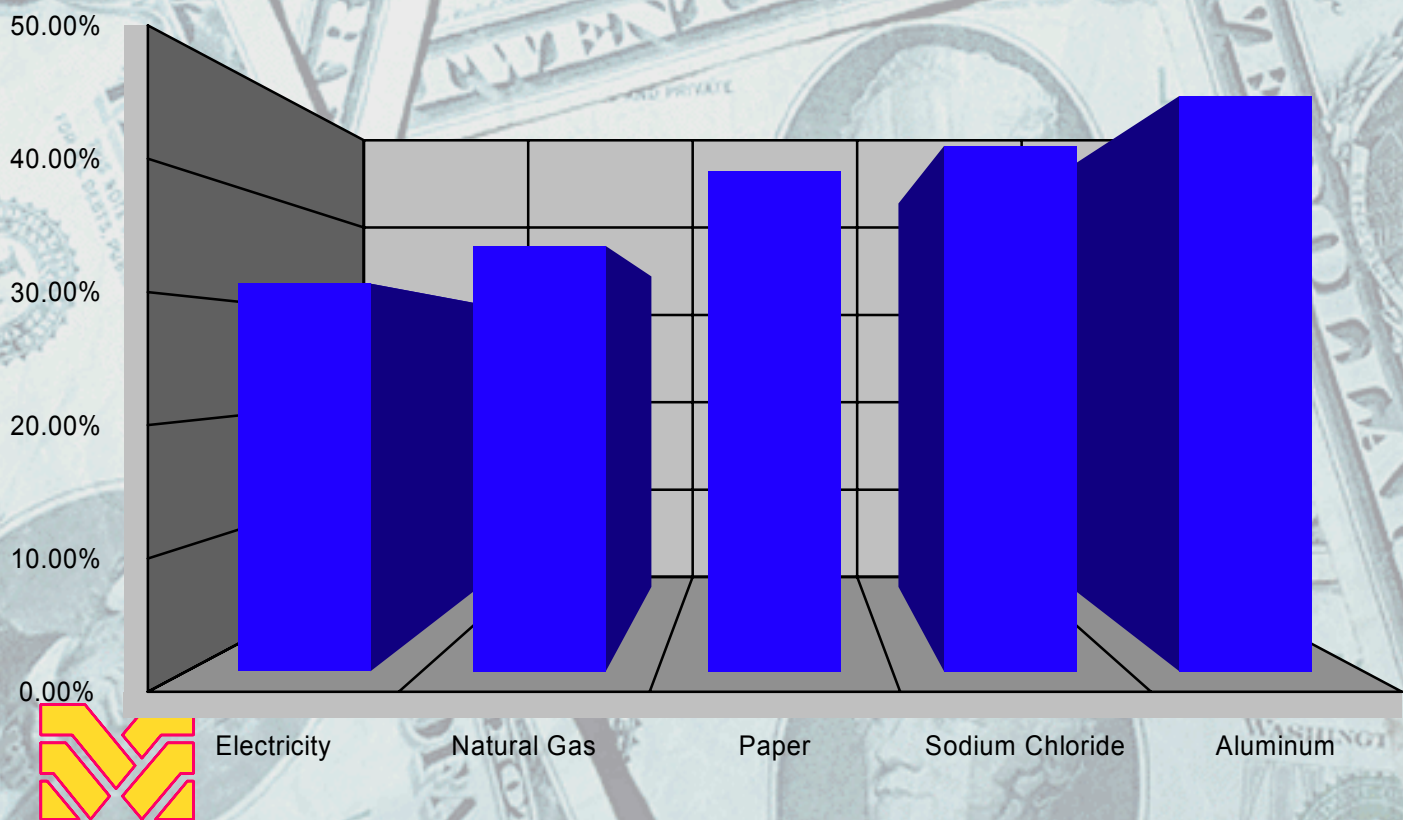


Risk

- Most customer are in a far riskier environment than their utility
- Traditional utility deals attempt to shield the customer from electric price risk
- Even the most cursory analysis would indicate that this is the wrong way around



Customer Risk Profiles



Time Horizons

- The average industrial facility is 17 years old
- The increasing rate of technological change is pushing the average age down
- Only regulatory policy prevented utilities from realizing that the economic life of utility plant is less than 20 years as well
- Most industry has a time horizon of one year
- Even new plants seldom have time horizons of five years

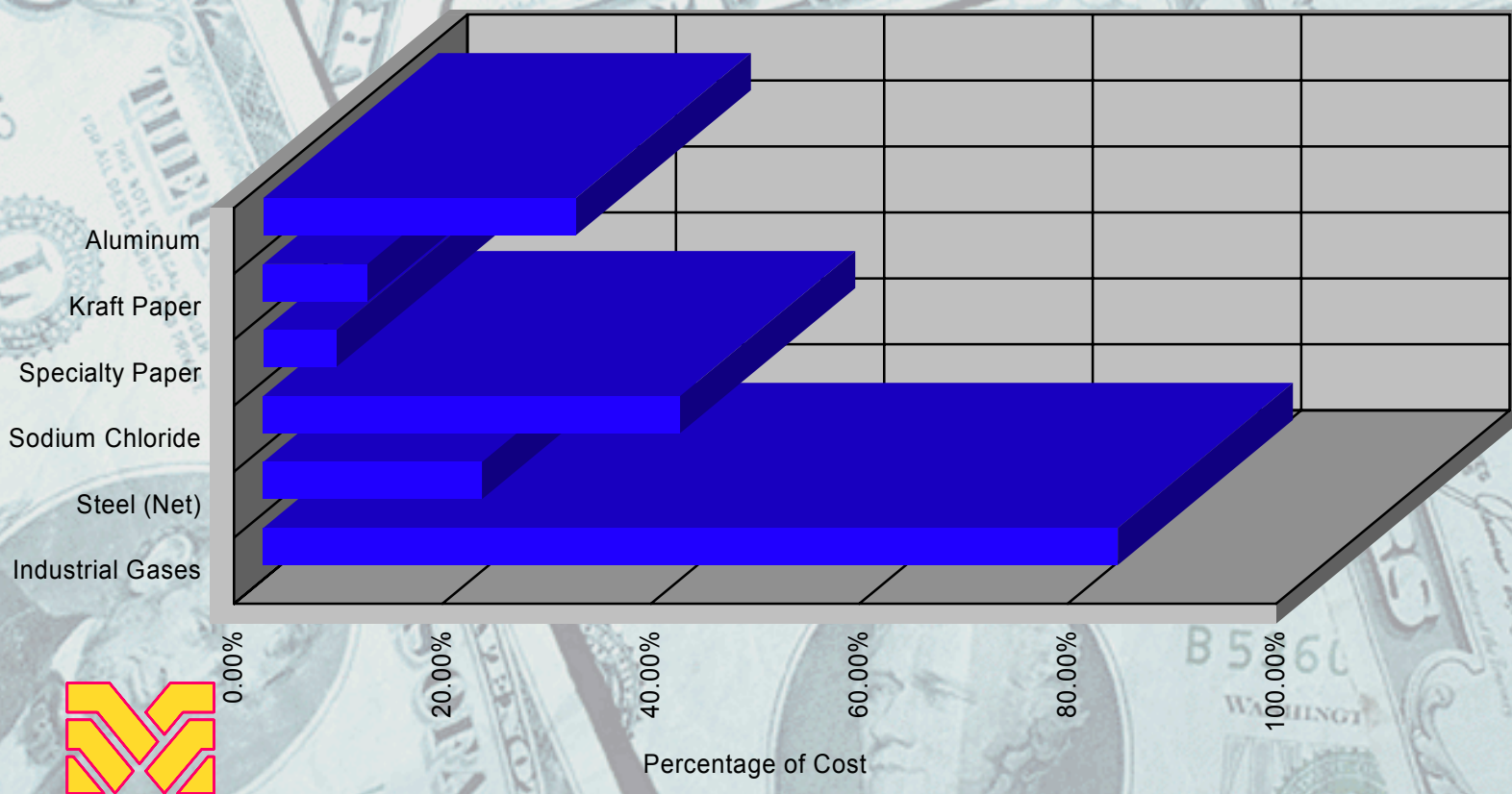


Economic Leverage

- **Very few customers have significant short term economic responses to price**
- **Few customers have significant medium term economic responses to price**
- **Most customers have some impact, but with the exception of chemicals, metals, and paper the impact is small**



Electricity Cost Contribution



Defining The Product

- **It's Just Porkbellies, Stupid!**
- **Non-firm, Interruptible, Financial Firm, and Utility Service**
- **Capacity Factors**
- **The Diminishing List Of Ancillary Services**



It's Just Porkbellies, Stupid!



Mark Hamblin

Non-firm, Interruptible, Financial Firm, and Utility Service

Do any of these gradations actually exist?

- **Non-firm power may simply not exist**
- **Interruptible power is seldom defined operationally**
- **Financial firm may be the only grade of power we have ever purchased**
- **Utility grade service would seem to be an aftereffect of regulatory incentives for overbuilding rather than a fundamental commitment to serve**



Capacity Factors

- **Competition may well spell the end of full requirements service**
- **Defining loads in terms of their fundamentals is likely to be the norm**
- **In the end, we may find that a MW value, a capacity factor, and an energy balancing account is the entire transaction**



The Diminishing List Of Ancillary Services

- **BPA at one point identified 60 ancillary services**
- **The end product of the competition may trim this list to one**
- **Almost all ancillary services are moving to the transmission function**
- **Reserves correctly belong to the generator**
- **The customer will most likely be left with only an energy balancing account as a service to buy**



Enabling Open Access

- Open access is like a membership to Costco - only undiscovered aborigines in the Brazilian rain forest are ineligible
- As a practical matter, every large consumer has the ability to seek alternative suppliers
- The list of exceptions to monopoly service is long and getting longer
 - Jurisdictional ambiguities (Oregon and Washington)
 - Competing service territories
 - Poorly written franchise agreements
 - Obsolete state law
 - Municipalization
 - Unilateral exit
 - Cogeneration



Where Does Open Access Come From?

- The simple truth is that the absence of alternative suppliers meant that no one ever tested the strength of the manacles holding the prisoners
- Like the British prison system of the 70s, once the inmates noticed that you could just walk out, they all left
- Al Alexanderson, General Counsel of PGC, quotes an unnamed friend as saying everyone always has open access



Where To Go For A Good Rumba

Type	Effective Tariff	Tariff
Spot Pricing		Puget Schedule 48
32.32 /kwh		Puget Special Tariffs
24.77 /kwh		PGE Schedule 67
30.94 /kwh		PP&L Low
17.70 /kwh		PP&L High Pricing
24.70 /kwh		BPA Special Tariff
17.00 /kwh		

Choosing The Tools

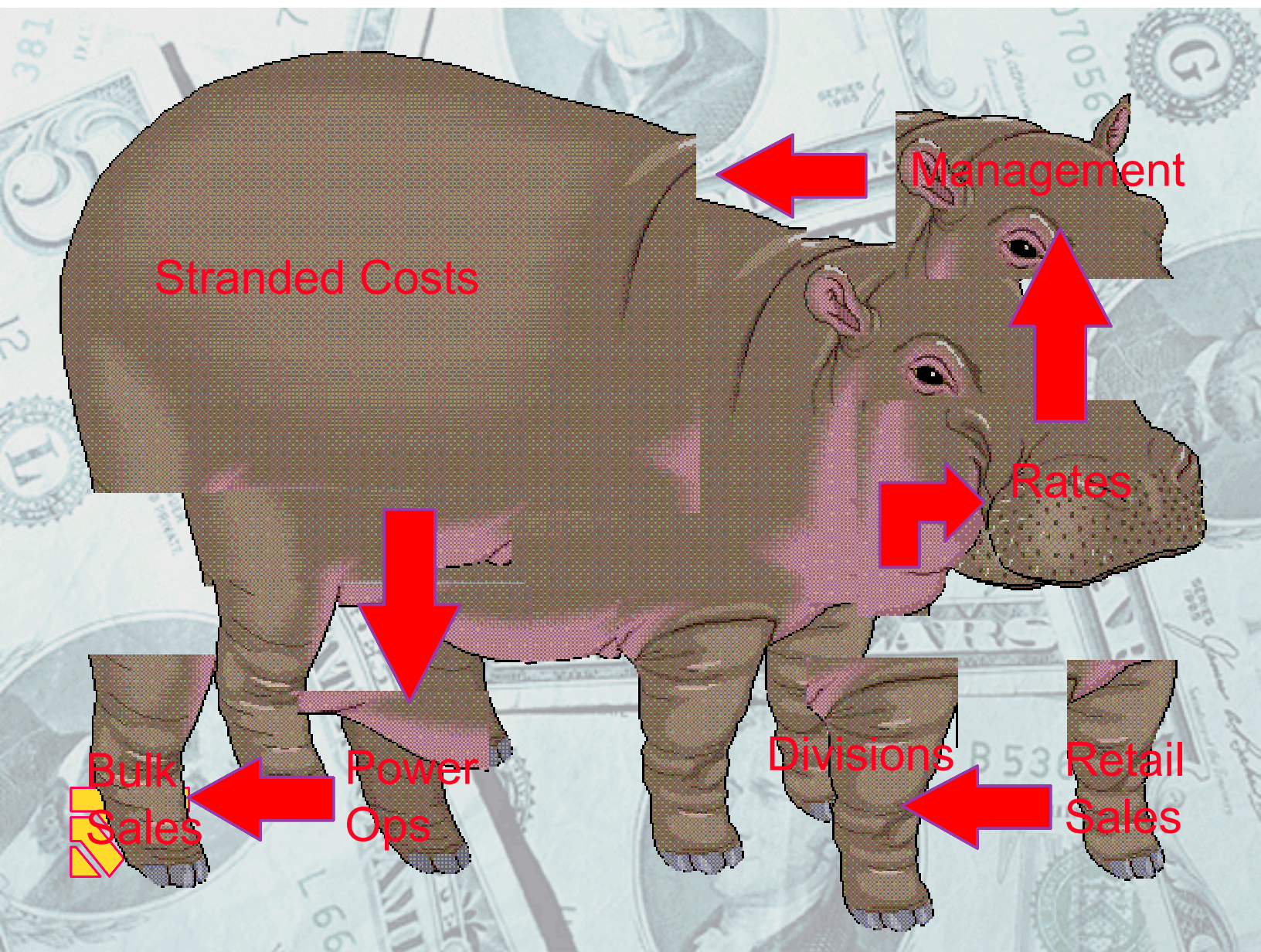
- The fundamental truth is that any open access strategy simply depends on consistency and dedication
- Adopt a strategy and proceed aggressively
- We are now recommending following Brett Wicox into the "Unilateral Exit" world



Getting Acquainted

- **Establishing Communication With Suppliers**
 - Setting up an RFP
 - Controlling Vendor Options
- **Communicate your plans with the existing supplier**
- **Talking to the Hippotamus**



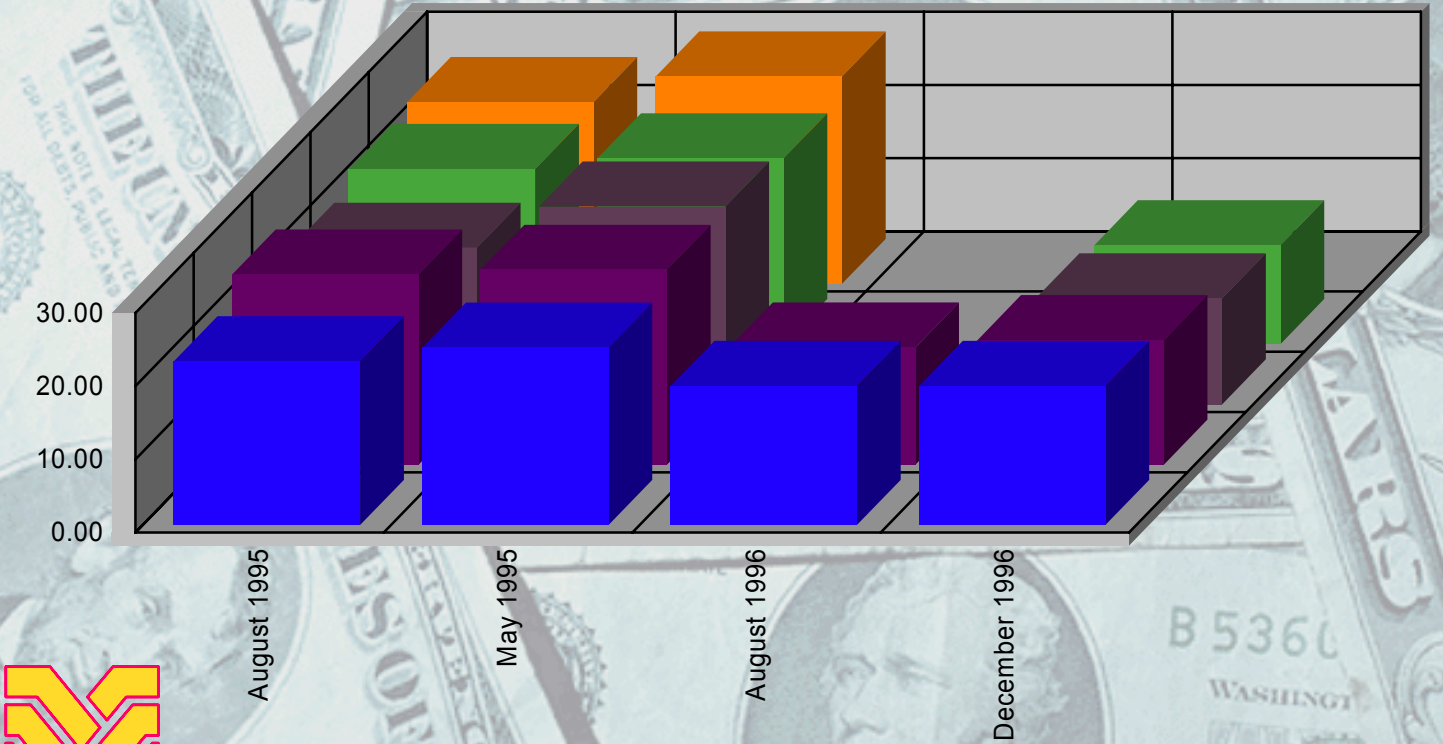


Communicating Effectively (Why an RFP?)

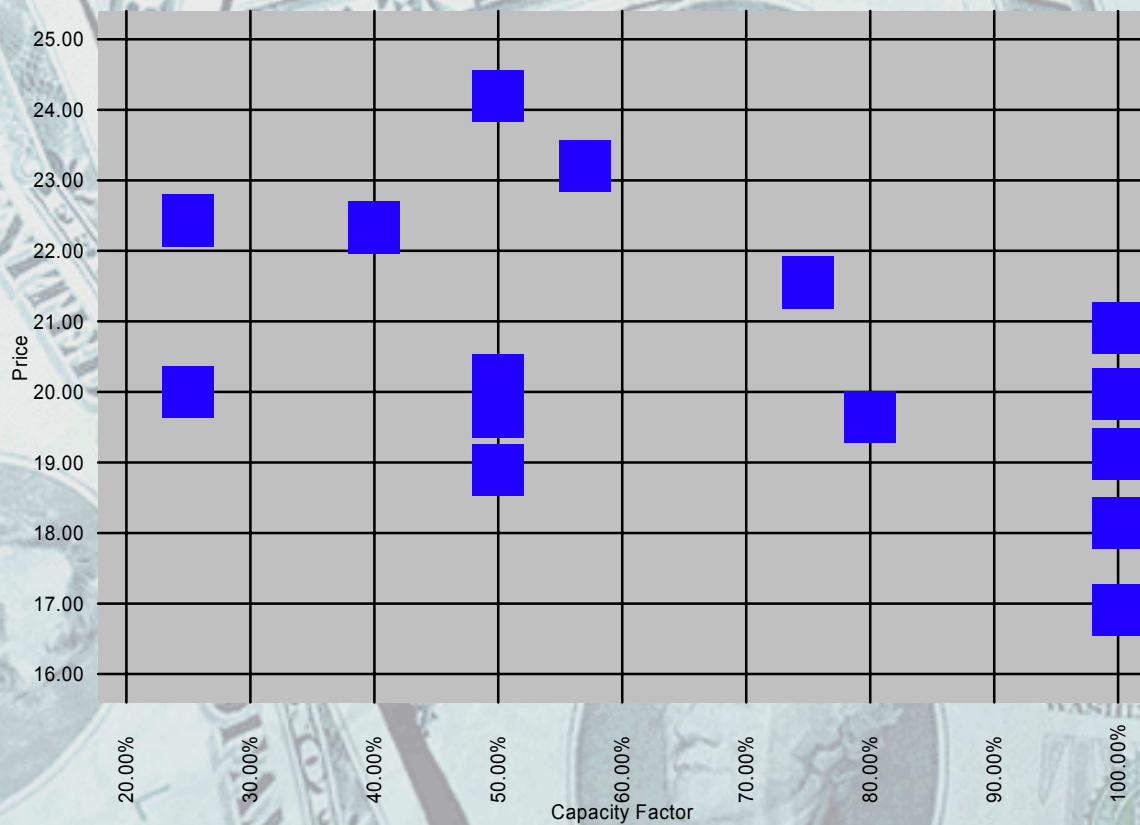
- Most vendors are still very unsophisticated
- Bonding seldom replaces a coherent term sheet
- Establishing the ground rules
 - Solid offers
 - Fixed prices held for a logical period
 - Apples to apples comparisons



Recent West Coast Prices



Current Bay Area Bids



Market Truths

- Capacity has become very, very cheap
- Energy indices are simple
- If they aren't simple, they aren't useful
- Industrial and bulk power markets have converged
- Prices are low and going lower



Driving To A Resolution

- Determining a deadline
- Establish a simple objective
- Follow through relentlessly

