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Presentation to Appropriations and Budget Committee

House of Representatives
State of Oklahoma

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Fundamental Economic Principles

- Incentives Do Matter
- Incentives are Effective "At the Margin"
- More is Preferred to Less
- Transparency and Perfect Information Improve Efficiency and Equity

Incentives Do Matter

In economics, an ***incentive*** is any factor (financial or non-financial) that enables or motivates a particular course of action, or counts as a reason for preferring one choice to the alternatives.

Incentives Do Matter (cont.)

Incentives can be classified as:

1. Remunerative Incentives
2. Moral Incentives
3. Coercive Incentives

Incentives are Effective "At the Margin"

Examples:

- Marginal utility
- Marginal cost
- Marginal revenue product
- Marginal propensity to consume
- Marginal tax rate

At what price of oil or natural gas would a producer elect to drill a well regardless of the tax incentive?

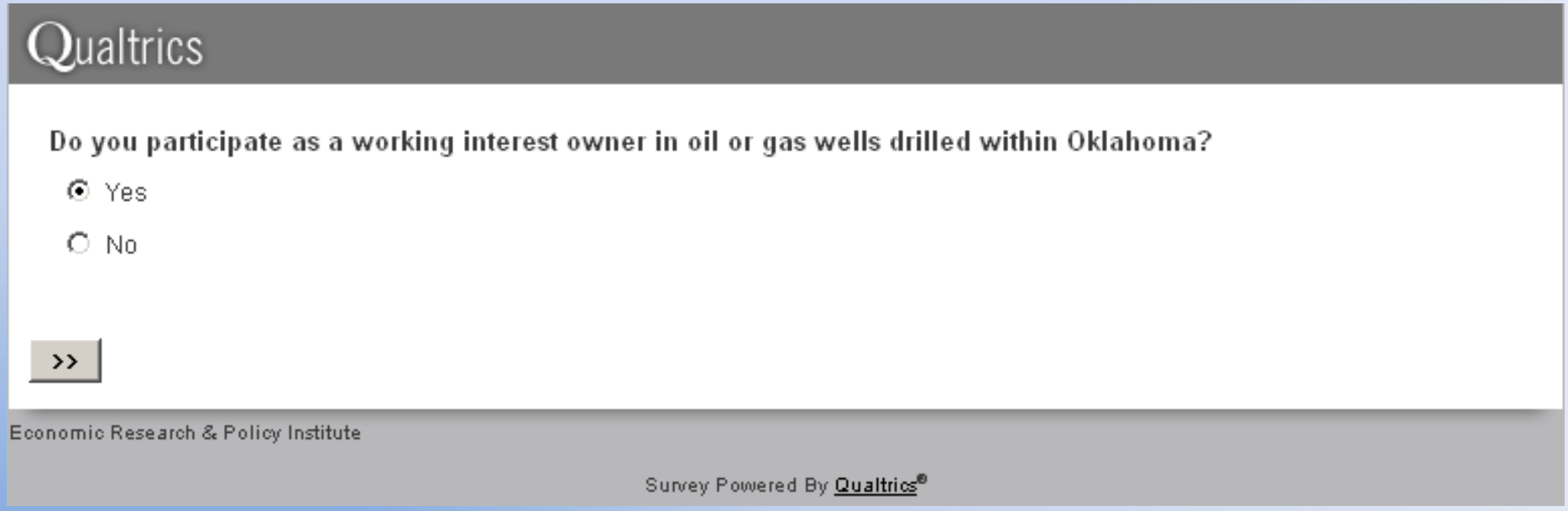
- At $10 per MMBtu or $120 per BBL, producers are typically going to elect to drill wells regardless of the GPT incentives.

- At $2.00 per MMBtu or $25 per BBL, producers are typically going to elect NOT to drill wells even if they have the GPT incentive.

Survey Information

- Oil and Gas Industry Electronic Survey
  - Sent out 125 surveys to leading members of the industry
    - Approximately 90 surveys were successfully sent out
      - Unsuccessful deliveries due to incorrect e-mail addresses
    - Some surveys may have been blocked by a spam filter
    - Received 29 responses to the first question
      - Received 25 completed surveys

Administered Survey



On an annualized basis, about how many wells do you participate in as a working interest owner that are drilled in the state of Oklahoma?

- ○ 1-5
- ○ 6-15
- ○ 16-30
- ○ 31-50
- ○ More than 50 per year

Listed below are variables that one might examine in determining whether or not to participate in a well proposal. Please rank these variables in order of importance to you in evaluating your decision to participate in a proposed well. (PLEASE RANK THESE VARIABLES from 1 to 10 with 1 representing the most important and 10 being the least important determinant. Do this by placing your cursor on the variable and "dragging" it to the appropriate spot in the order)

Price of Oil/Price of Natural Gas as shown in the futures market at the time of election to participate	1
Drilling rig availability	2
Location of proposed well (as it relates to roads, pipelines, accessibility)	3
State tax incentives (deep well, horizontal well, enhanced recovery, etc.)	4
Estimated cost to drill and complete the proposed well	5
Estimate of recoverable reserves	6
Location of well (as it relates to being on "fee" surface lands or "Restricted Indian Lands"	7
Location of proposed well (as it relates to a particular area in the state that you are familiar with geologically/geophysically)	8
Price of Oil/Price of Natural Gas at the time of election to participate	9
Geology of the prospect	10

Are there any other considerations not listed above? If so, please explain briefly.

- ○ No
- ○ Yes

When making a determination to participate in a well proposal would you say you ALWAYS, OCCASIONALLY, RARELY, or NEVER consider the following variables in your decision-making process?

	Always	Occasionally	Neutral	Rarely	Never
Geology of the prospect	○	○	○	○	○
Estimate of recoverable reserves	○	○	○	○	○
Price of Oil/Price of Natural Gas at the time of election to participate	○	○	○	○	○
Price of Oil/Price of Natural Gas as shown in the futures market at the time of election to participate	○	○	○	○	○
Estimated cost to drill and complete the proposed well	○	○	○	○	○
State tax incentives (deep well, horizontal, well, enhanced recovery, etc.)	○	○	○	○	○
Location of proposed well (as it related to roads, pipelines, accessibility)	○	○	○	○	○
Location of proposed well (as it relates to a particular area in the state that you are familiar with geologically/geophysically)	○	○	○	○	○
Location of the well (as it relates to being on "fee" surface lands or "Restricted Indian Lands")	○	○	○	○	○
Drilling rig availability	○	○	○	○	○

What is your estimated "finding" cost for oil?

- ○ $0-5 per barrel
- ○ $5-10 per barrel
- ○ $11-20 per barrel
- ○ $21-30 per barrel
- ○ $30-40 per barrel
- ○ Over $40 per barrel

What would you estimate the price of oil would have to be to entice you to drill the types of wells you typically drill? That is, based upon expected costs, what is the oil price break point that would cause you to drill or not to drill a well?

- ○ $0-20 per barrel
- ○ $20-30 per barrel
- ○ $30-40 per barrel
- ○ $40-50 per barrel
- ○ $50-60 per barrel
- ○ Over $60 per barrel

What is your estimated "finding" cost for natural gas?

- ○ $0.00 - $1.00 per Mcf
- ○ $1.00 - $1.75 per Mcf
- ○ $1.75 - $2.50 per Mcf
- ○ $2.50 - $3.25 per Mcf
- ○ $3.25 - $4.00 per Mcf
- ○ Over $4.00 per Mcf

What would you estimate the price of natural gas would have to be to entice you to drill the types of wells you typically drill? That is, based upon the expected costs, what is the natural gas price break point that would cause you to drill or not to drill a well?

- ○ $0.00 - $2.00 per Mcf
- ○ $2.00 - $2.75 per Mcf
- ○ $2.75 - $3.50 per Mcf
- ○ $3.50 - $4.25 per Mcf
- ○ $4.25 - $5.50 per Mcf
- ○ $5.50 - $6.25 per Mcf
- ○ Over $6.25 per Mcf

How would you classify yourself or your company as to "operations" of wells to be drilled?

- ○ We operate and prefer to operate
- ○ We operate but will defer to others if they have more experience in a particular area
- ○ We will operate only when we need to
- ○ We do not operate
- ○ Other

Have you ever had an experience with Visual Lease Services (VLS)?

- ○ Yes
- ○ No

Have you ever filed for a refund with the Oklahoma Energy Resources Board (OERB)?

- ○ Yes
- ○ No

Have you ever filed for a refund with the Oklahoma Tax Commission for gross production tax incentive rebates?

- ○ Yes
- ○ No

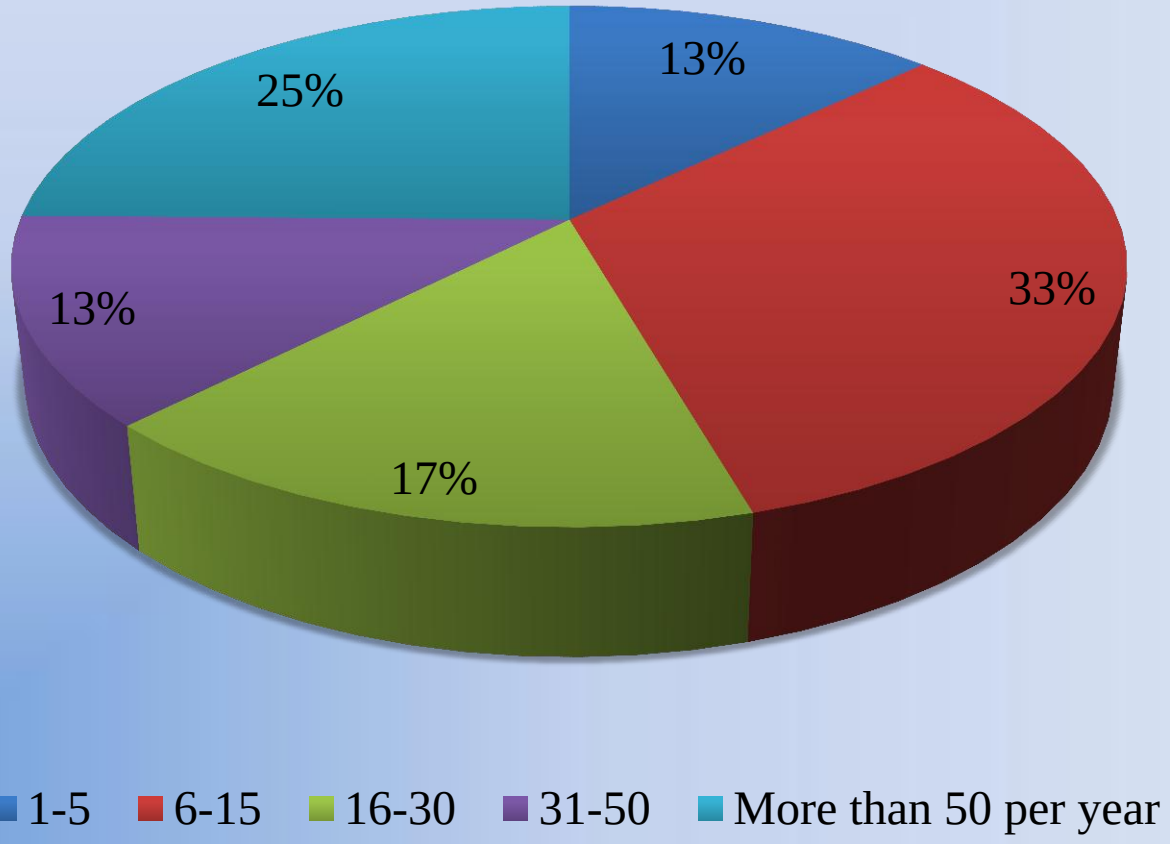
Has the availability of a gross production tax incentive rebate ever caused you to drill or not to drill a well. That is, given other variables like the price of oil and natural gas, the cost of drilling, the prospect geology, and other considerations, have you ever calculated the additional tax incentive that would cause you to drill a well that you might not otherwise drill?

- ○ We are not familiar with gross production tax incentives and therefore no consideration is typically given to this in evaluating the decision to drill a well
- ○ Accountants in our company calculate any tax incentives after the well had been drilled, completed and is producing; but it is not something critical to our thinking before we drill the well
- ○ We realize there are state tax incentives for drilling certain types of wells in Oklahoma, but they are not influential in our decision to participate in a well
- ○ We realize there are state tax incentives for drilling certain types of wells in Oklahoma, and they are influential in our decision to participate in a well
- ○ We always calculate into our decision-making the gross production tax incentives available
- ○ Other

Would you please provide us with the name of your company and the primary office from which you do business in the state of Oklahoma?

Company Name	
Primary Office	

Participation in Wells as a Working Interest Owner



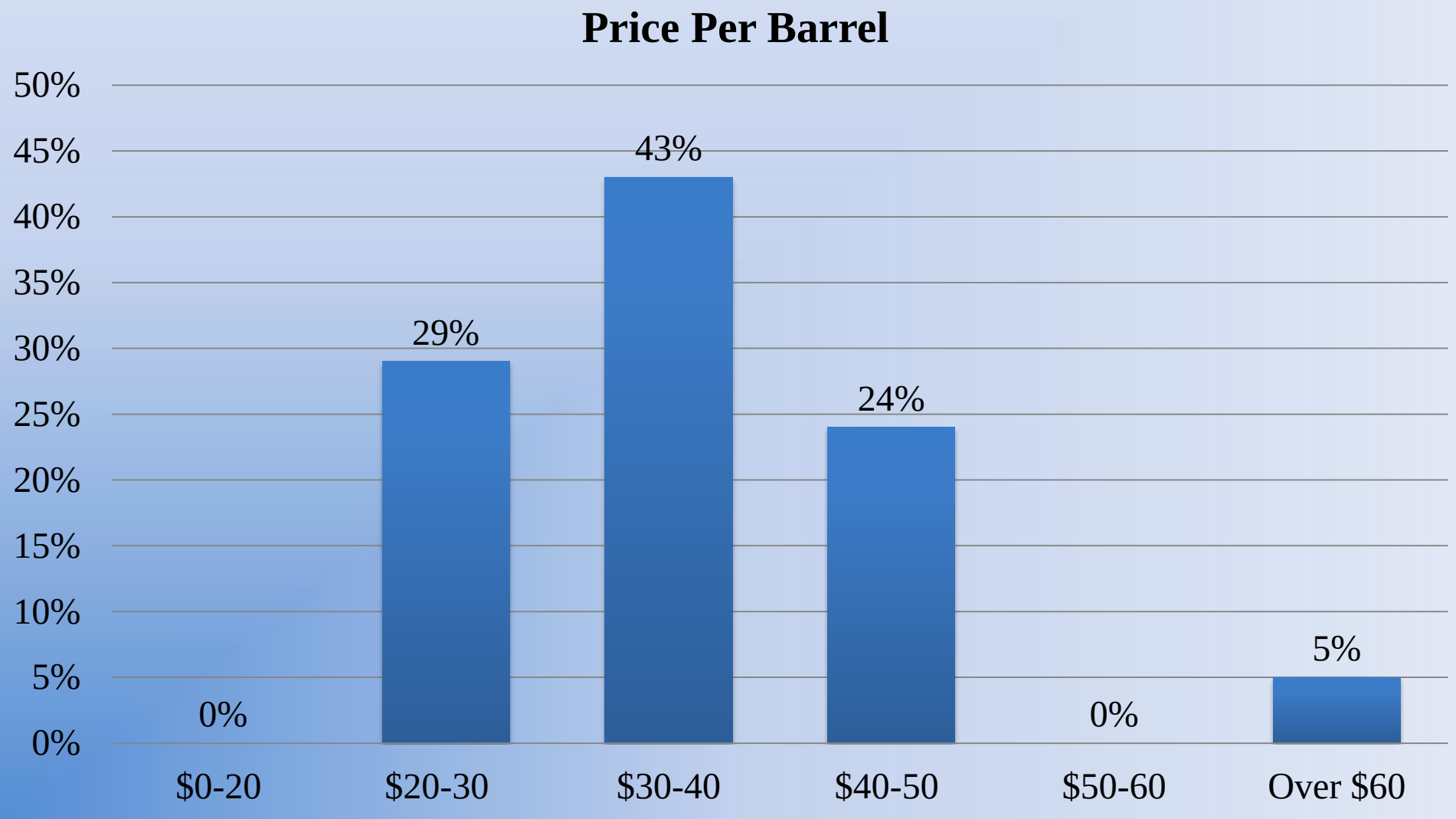
Ranked Responses of Variables Affecting Decision to Drill

1. Estimate of recoverable reserves
2. Geology of the prospect
3. Estimated cost to drill and complete the proposed well
4. Price of Oil/Price of Natural Gas as shown in the futures market at the time of election to participate
5. Location of proposed well (as it relates to a particular area in the state that you are familiar with geologically/geophysically)
6. Price of Oil/Price of Natural Gas at the time of election to participate
7. Location of proposed well (as it relates to roads, pipelines, accessibility)
8. Drilling rig availability
9. Location of well (as it relates to being on ”fee” surface lands or “Restricted Indian Lands”
10. State tax incentives (deep well, horizontal well, enhanced recovery, etc.)

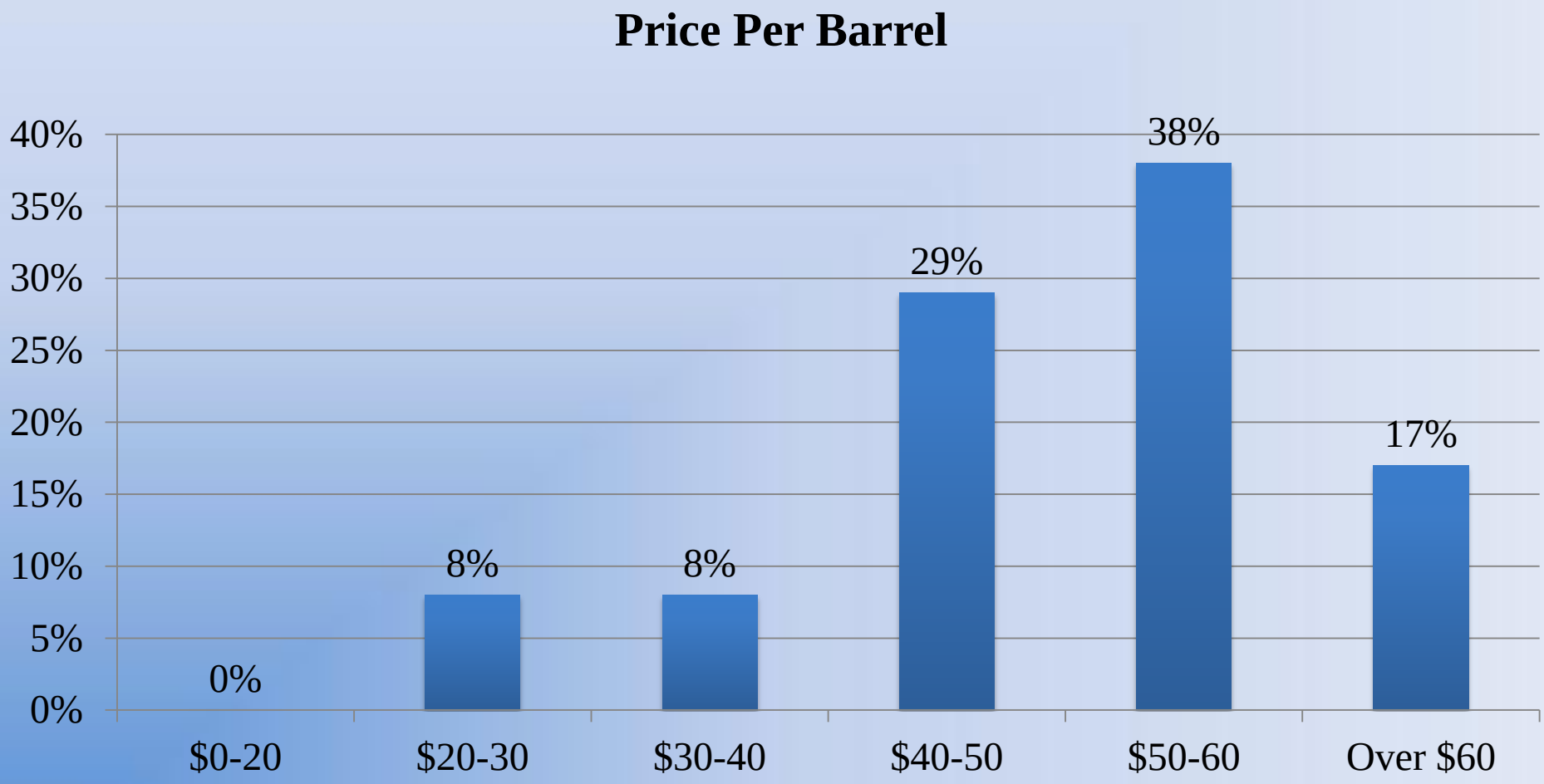
Industry Priorities cont.

- When asked if these variables were “always, often, seldom, or never” addressed
  - 8% of respondents said state tax incentives were “never” addressed
  - State tax incentives was the only option that received “never” ratings

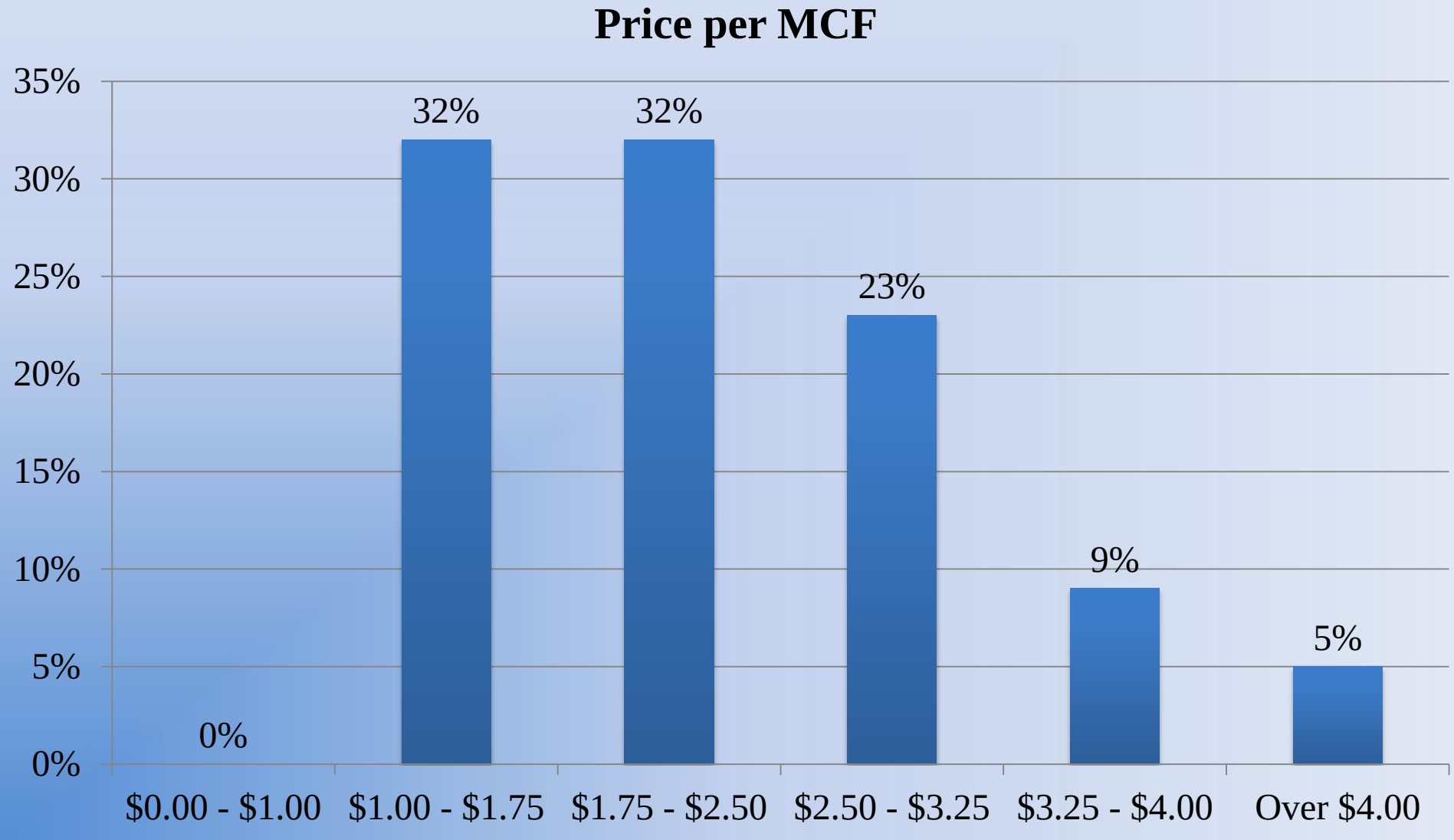
Estimated Finding Cost for Oil



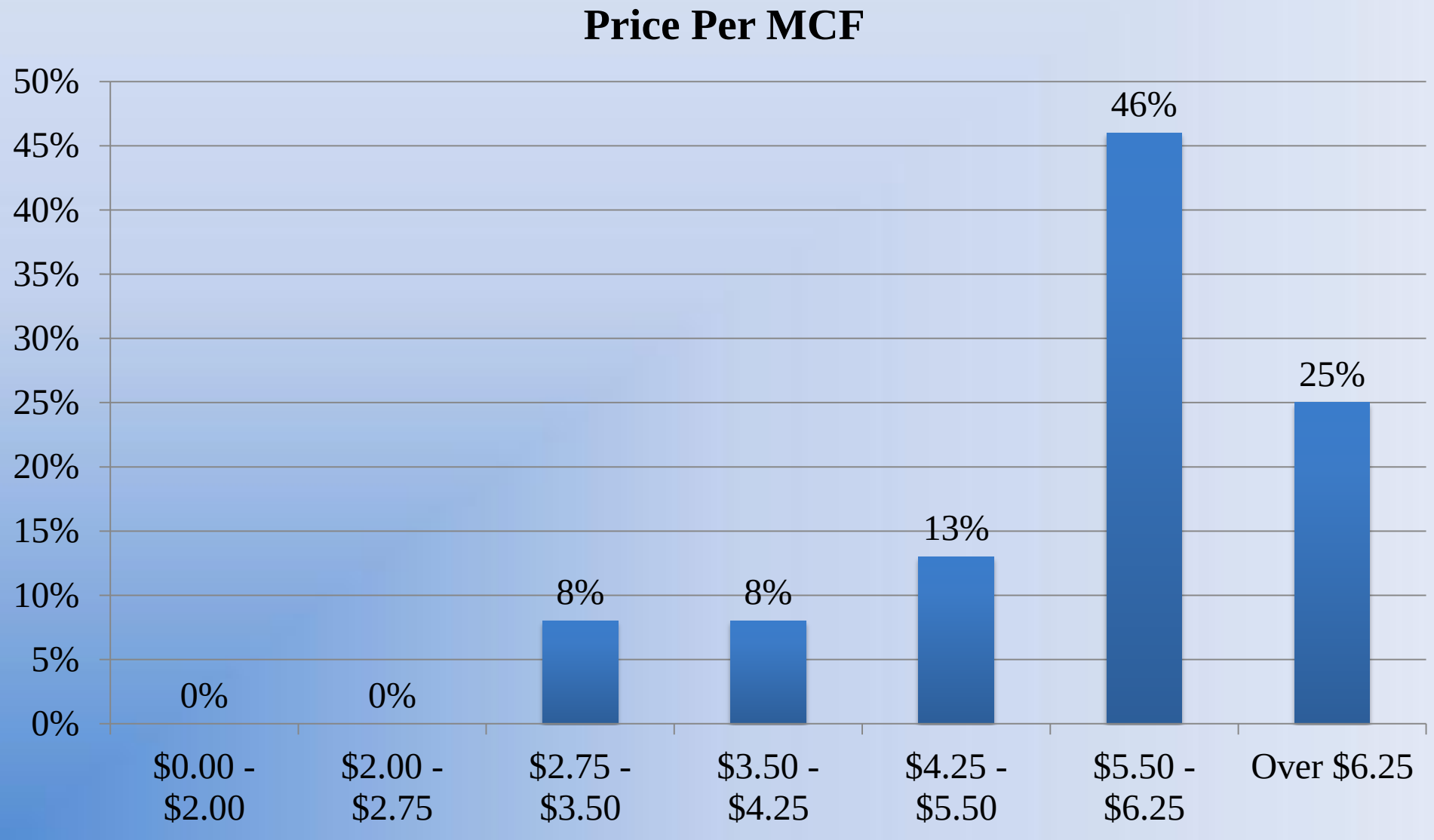
Oil Price "Break Point"



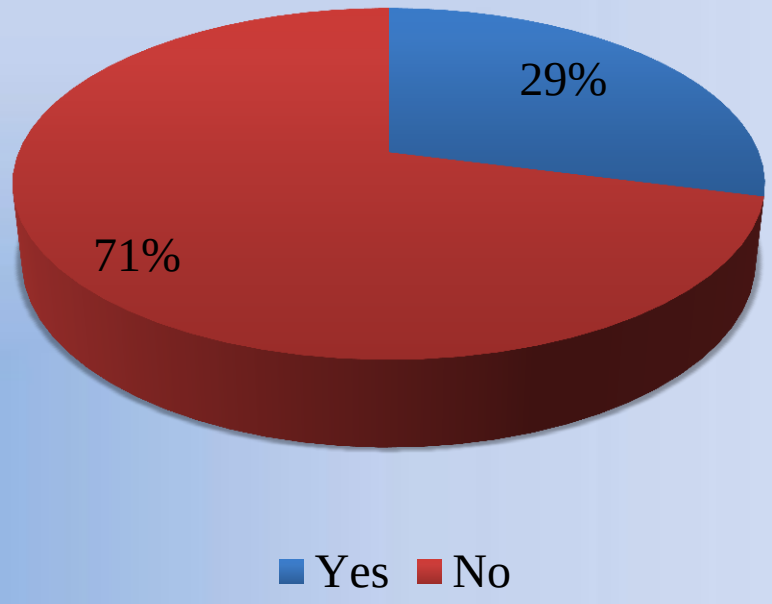
Estimated Finding Cost for Natural Gas



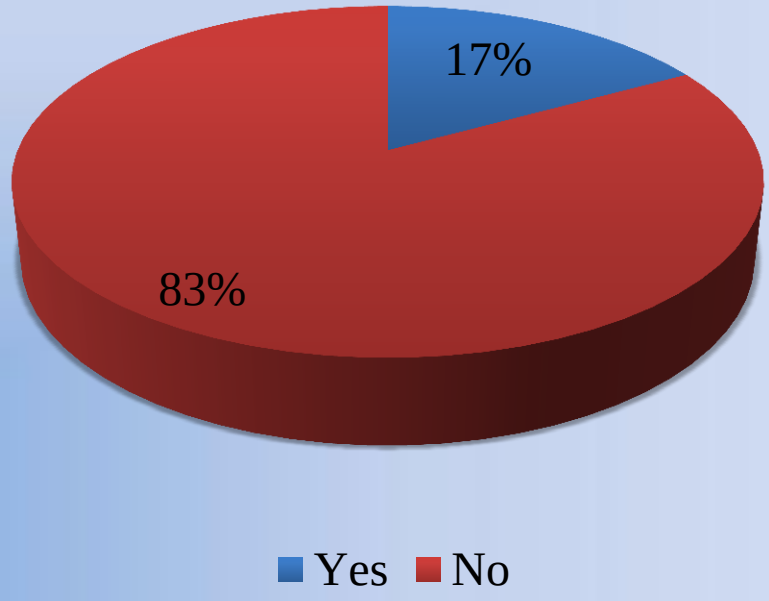
Natural Gas Price "Break Point"



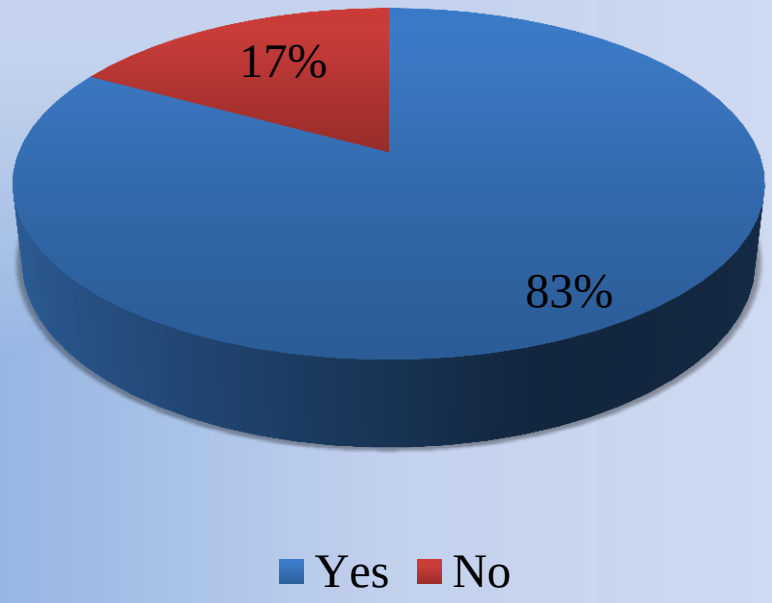
Experience with Visual Lease Services (VLS)?



Filed for a refund with the Oklahoma Energy Resources Board (OERB)?



Filed for a refund with the Oklahoma Tax Commission for gross production tax incentive rebates?



Has the availability of a gross production tax incentive rebate ever caused you to drill or not to drill a well?