GETTING OLD BUT STILL ACTING YOUNG – are your wells as old as they look?

Oyin Adeniji, Drilling Engineer
What am I here to talk about

- METHODOLOGY

The What – Understanding well integrity risks associated with Spirit Energy wells

The Why – Managing the degradation, ageing and the potential extension of life of wells

The How – Engaging other operators on best practices for managing late-life production

The Now – Plan for life cycle management strategy
Risky business
- WELLS RISK INDEX

Risk Ranking
To determine well risk profile

Collaboration
Inputs from other operators

Ranking Results
Well database of information
Collaboration is Key
- INDUSTRY RESEARCH

- Integrity Risk Criteria
- Proactive Measures
- Risk Based Inspection
- Condition Monitoring
- Actions or Interventions

UK Operators Well Types

Number of Oil Wells

Number of Gas Wells
The plan moving forwards

- WELL LIFE CYCLE STRATEGY

Intervention Data

Annulus Monitoring

Conductor Study

Post Abandonment Inspections

Annual Well Reviews
Hello down there...

- OPPORTUNISTIC INTEGRITY INTERVENTIONS

Cost Effective Tools
Compatible with existing Intervention plans

Data Analysis
Review data to build understanding of the well

Adding Value
Providing valuable data
The autopsy - POST ABANDONMENT INSPECTIONS
What’s trending?
– ANNULUS MONITORING

Enables Annulus Trending

Improved Engineering Focus

Accurate, Continuous Pressure Data

One System

Condition Monitoring
What’s trending?

– ANNULUS MONITORING

Chiswick C3 Annulus data, 3 years, 1 year, 2 months
Annual health check
– ANNUAL WELLS REVIEWS

Well Production
Understanding conditions and operation of the well

Cross Functional
Inputs from production and well engineers

Compile Information
Well database of information
Not to be overlooked
- CONDUCTORS

- Load Cases Evaluation
- Failure Mode Driven Inspection
- Research
- Review Subsea Inspection Data
- Recommend Risk Based Inspection
Adding pieces to the puzzle
- CONCLUSION

- Annual Well Reviews
- Post Abandonment Assessment
- Conductor Analysis
- Opportunistic Interventions
- Detailed Annulus Analysis
THANK YOU