

### **Investor Relations**

Paul Benoit FGP Project Director

May 11, 2011

Atyrau, Kazakhstan



## **Future Growth Project Overview**

- Builds on SGI/SGP
- A key component of Tengiz Field development strategy
- Proper asset management will increase reserves
- Adds value production growth, economics

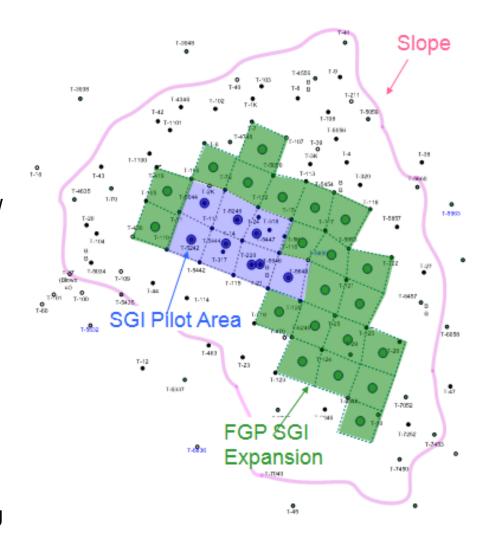






**Gas Injection Expansion Development** 

- Expansion of GasInjection Technologyacross Platform
  - 15 20 new injection patterns
  - Approximately 10 new producers required to complete the injection patterns
- Complete Slope Development
  - Approximately 160
     additional further
     producers required to
     complete 1km spacing
     slope development

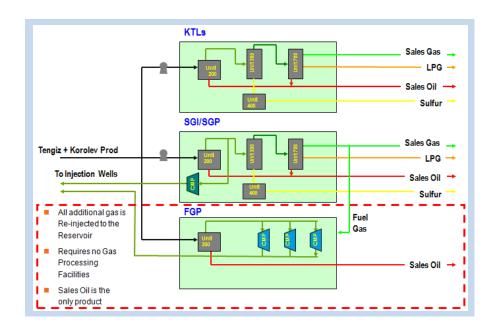




#### **Project Overview**

#### **Project Scope**

- Facilities include
  - New gathering system
  - Crude processing
  - Gas injection
  - Crude tankage
  - Power and utilities
  - Infrastructure
- Pressure Boost Facility
  - Increases well deliverability
  - Benefits both FGP and existing facilities
- New wells
  - Keep existing plants (KTL, SGI/SGP) full
  - Fill new (FGP) facilities
  - Re-inject all FGP gas



### **Project Concept**

Expanded Oil Capacity: 12 MMTY

(~ 260 MBOPD)

Expanded Gas Capacity: 960 MMSCFDD

■ Drilling: ~190 new wells

Execution: Modular Strategy

All numbers shown are TCO 100%



### **Execution**

- FEED / EPCM Contractor will form JV with Kazakhstani Company(s)
- Early Works Program will be committed ~9 months after FEED begins
- All major construction and fabrication contracts ready to award by Final Investment Decision
- Modules will be fabricated inside and outside Kazakhstan

#### **Current Status**

- Technically ready for FEED, and waiting for partners' endorsement
- Completed FEED/EPCM bid evaluation from 3 joint ventures
  - All include one or more Kazakhstani companies with a major western contractor





© Tengizchevroil 2011



# Future Growth Project Building on Lessons Learned

### **FGP optimizes SGI/SGP technology**

- New technologies tested in SGI/SGP
  - Injection compressor uses same shaft size and seals (largest facility uncertainty in SGI/SGP)
- Major equipment in the oil separation and treating section will be the same as in SGP
- Construction strategy will be modular instead of stick-built
  - Reduces site man-hours, increases productivity, increases schedule certainty

#### Comparison of SGI/SGP to FGP

	SGI/SGP	FGP
Oil & Gas Plant (12 MMTY)	✓	✓
Power Generation	✓	✓
Sour gas injection island + utilities	✓	✓
Field gathering lines	✓	✓
Sulphur plants	✓	n/a
LPG Plant / Gas Treatment	✓	n/a
Pressure Boost Facility	n/a	✓

#### SGP facilities showing FGP replication



SGI facilities: replicated with FGP



© Tengizchevroil 2011







© Tengizchevroil 2011